

Digitized by the Internet Archive  
in 2007 with funding from  
Microsoft Corporation



Bb  
T

A

TECHNICAL BOOK REVIEW INDEX

///

VOL.1

(1917)

696 -

TECHNICAL BOOK REVIEW INDEX

VOL. I

(1917)



36  
1  
UNIVERSITY BOOK REVIEW INDEX

VOL. 1

NO. 1

UNIVERSITY OF TORONTO  
M. S. of  
Jan 1950

Abstract from  
Carnegie Library  
of Pittsburgh

see preface  
to issue

July, 1917

Vol 1, no 4



Bb  
T

184873

TECHNICAL BOOK REVIEW INDEX

VOL.1

NO.1

March 1917

Abstracted from  
Carnegie Library of Pittsburgh  
Monthly Bulletin

Vol 22



579484

4.3.54

NO. 1

NO. 1



**Wallace, Dillon.**

j W1758

The gaunt gray wolf; a tale of adventure with "Ungava Bob."  
Revell.

As trappers together, Shad Trowbridge and "Ungava Bob" face danger and hardship in the wilds of far-away Labrador.

**Wallace, Dillon.**

j W175u

Ungava Bob; a winter's tale. Grosset. (Every boy's library; boy scout edition.)

Story of a plucky young trapper and his adventures in the remote regions of Labrador.

**Warren, Mrs Maude Lavinia (Radford), comp.**

j 398.25 W24

King Arthur and his knights; illustrated by W. J. Enright. 1905.  
Rand.

Stories from Malory's "Morte Darthur" and Tennyson's "Idylls of the king." Designed as a reading book for fifth and sixth grades.

**Wynne, Gladys.**

j 720.9 W99

Architecture shown to the children. [1913.] Jack. ("Shown to the children" series.)

*Contents:* Greek architecture.—Roman architecture.—Byzantine architecture.—Romanesque architecture.—Norman architecture.—Gothic architecture.—Renaissance architecture.

Well illustrated.

## Technical Book Review Index

This index, printed from part of a card-index maintained by the Carnegie Library of Pittsburgh, is a record of certain book reviews appearing in the scientific, technical and trade journals currently received in the Technology Department. It is concerned mainly with books on pure and applied science, but includes a few on allied subjects. Its purpose is primarily to *index* reviews rather than to compete with any existing booklist by suggesting books on any subject, or by furnishing bibliographic information. In accordance with this plan, the arrangement is by authors, though the form of entry, being determined from the review and not from the book itself, is in some cases doubtless incorrect.

Except for the correction of obvious errors, the bibliographic information is as given in the review, or as combined from two or more reviews when several are indexed. Since many of the reviews are carelessly done, the information given is, in many cases, both inaccurate and incomplete. In general the names of publishers are abbreviated in accordance with the practice in the more important book-trade bibliographies. Titles of journals are as a rule given in full.

Each quotation immediately follows the name of the journal from which it is taken. Obviously these brief extracts when thus detached from the context, must not be accepted as conclusive. Very often a review is so equivocal that there can be no unanimity of opinion as to whether it is favorable or unfavorable. For this reason no estimate is given here. Except for this one omission, this index is an exact copy of cards filed in the book review index of the Carnegie Library of Pittsburgh.

The "Technical Book Review Index," published in April and July 1915 by the Index Office, Inc., Chicago, consisted of a record of technical book reviews furnished by the Carnegie Library of Pittsburgh.

This first issue of the Technical Book Review Index to be published by this Library includes reviews appearing since January 1, 1917. For the present it will be continued monthly.

### Akimoff, N. W.

Elementary course in Lagrange's equations. 195 p. Phil. Bk. Co., \$2.

*American machinist*, Feb. 22, 1917, p.352.

"As Lagrange's method is the most powerful device in mechanics, a work of this kind by a practicing engineer is a valuable addition to technical engineering literature. . . . It will undoubtedly prove useful in supplementing the limited treatment characteristic of most elementary textbooks on mechanics."



**Alexander, T. & Thompson, A. W.**

Elementary applied mechanics. 512 p. 1916. Macmillan, 15s.

*Science progress*, Jan. 1917, p.532.

"Deals only with a fraction of the subjects usually scheduled under this title... May well serve as a text-book for the undergraduate in engineering science during his college career."

**Allen, Glover M.**

Whalebone whales of New England. 107-322 p. 1916. (Memoirs of the Boston Society of Natural History, v.8, no.2, p.107-322.)

*Science*, Jan. 26, 1917, p.89.

"Forms a valuable addition to the literature of the subject, constituting, as it does, the first attempt to treat comprehensively this important part of the marine mammal fauna of New England, and is a highly satisfactory summation of present knowledge of the subject. A bibliography of six pages (about 100 titles) gives references to technical literature cited in the text."

**American Manufacturers' Export Association—American Industrial Commission to France.**

Franco-American trade; report by the American Industrial Commission to France to the American Manufacturers' Export Association. 256 p. 1916. Amer. Manufacturers' Export Assoc.

*Iron age*, Feb. 8, 1917, p.379.

"Report of the commission which visited France under the auspices of the American Manufacturers' Export Association last September and October and at the behest of certain French authorities."

**American Wood Preservers' Association.**

Handbook on wood preservation. 74 p. Amer. Wood Preservers' Assoc., \$1.

*Railway age gazette*, Jan. 19, 1917, p.84.

"The purpose of this book is to present in concise form the essential information concerning the preservation of timber which has appeared in the proceedings of the American Wood Preservers' Association and elsewhere during recent years...Contains a chronology of the development of wood preservation in this country...also...a bibliography."

**Archbold, Maurice J.**

Laboratory course of practical electricity for vocational schools and shop classes. 222 p. Macmillan, \$1.10.

*Electrical world*, Feb. 16, 1917, p.281.

"Arranged in loose leaf form so that the teacher may arrange the experiments to suit conditions. Most of the tests are arranged for work with commercial apparatus which gives the student an insight into the kind of work he will be required to do in the electrical field."

**Arnold, J. Loring.**

Concise technical physics. 275 p. 1916. McGraw, \$2.

*Engineering-education*, Jan. 1917, p.296.

"The statement[s] of laws, principles, and definitions are short, definite and concise and the book contains only what can be required of every student."

**Ashton, William Easterly.**

Textbook on the practice of gynecology; ed.6, thoroughly revised. 1,097 p. 1916. Saunders, \$6.50 net.

*Pennsylvania medical journal*, Feb. 1917, p.380.

"Each subject considered is presented in great detail, leaving no gaps to cause doubt or confusion in the mind of the reader...Careful revision has been given to the present edition...Dr. Ashton's book has been before the profession for nearly a dozen years, and it has fulfilled a need."

**Avery, A. H.**

Electric lighting. 150 p. Cassell, 1s.

*Electrician*, Jan. 5, 1917, p.447.

"Practical guide to the wiring of houses and the installing of electric light plants; it does not deal with electric lighting in its more general aspects."

**Bacon, R. F. & Hamor, W. A.**

American petroleum industry. 2v. 1916. McGraw, 42s.

*Engineering*, Jan. 5, 1917, p.14.

"A valuable collection of material...accompanied by well-selected illustrations of machinery that make the text easy to follow."

*Mining magazine*, Jan. 1917, p.57.

"Forms a valuable addition to literature on petroleum and is of particular interest to the refinery."

**Bahier, Eug.**

Recherche méthodique et propriétés des triangles rectangles en nombres entiers. 266 p. 1916. Hermann, Paris, 8 fr. 50.

*Revue générale des sciences pures et appliquées*, Jan. 15, 1917, p.27.

**Bailey, E. H. S.**

Source, chemistry and use of food products. 517 p. 1914. Blakiston, \$1.60.

*American food journal*, Feb. 1917, p.103.

"Dr. Bailey's very complete handling of the subject of foods is of such nature as to demand its inclusion in any list of titles designed to cover the subject of foods."

**Bailey, E. H. S. & Cady, H. P.**

Laboratory guide to the study of qualitative analysis; ed.8, rev. by Paul V. Faragher in collaboration with authors. 294 p. Blakiston, \$1.50 net.

*Journal of physical chemistry*, Jan. 1917, p.80.

"In the preface the authors say:...'Some typographical errors have been corrected, and some sections which experience has shown are difficult of comprehension by the student, or not sufficiently definite, have been amplified or rewritten.'"

*Journal of the American Chemical Society*, Feb. 1917, p.329.

"The selection of the tests and separations is good and the directions are clear and concise. The reviewer notes with pleasure the treatment of oxidation and reduction and the inclusion of the method for balancing oxidation-reduction reactions."

**Bailey, L. H. ed.**

Standard cyclopedia of horticulture. 1916. Macmillan, \$6.

*Scientific American*, Feb. 10, 1917, p.162.

"A most able compilation, carefully describing the plants commonly grown in the United States and Canada, including both purely ornamental flowers and trees and the useful fruits and vegetables."

**Ball, Sarah B. comp.**

One thousand six hundred business books. 1916. H. W. Wilson, \$.75.

*American industries*, Feb. 1917, p.42.

"This is the first catalog of business books that has come to our attention and that alone makes it noteworthy...A partial list of the material in the [Newark Public Library Business Branch]...Will be suggestive to any library wishing to add to its business collection."

**Barber, F. D. and others.**

First course in general science. 607 p. 1916. Holt.

*Nature*, Jan. 4, 1917, p.348.

"It is difficult to form an opinion as to the general suitability of a book of this sort: usually one tells children about these things...Probably the best use of the book is as a teacher's guide to give him 'copy' which he can work up and adapt to his own class."



**Basford, H. M.**

How to sell printing. 126 p. Oswald Pub. Co., \$1.50.

*Inland printer*, Feb. 1917, p.680.

"The work is covered in fourteen chapters, and each chapter takes up a distinct phase of the problem of selling the product of the printing plant."

*Printing art*, Jan. 1917, p.405.

"Emphasizes the importance of making a distinction between selling printing and selling other merchandise, and points out the things to remember when approaching the buyer of printing."

**Battle, John Rome.**

Lubricating engineer's handbook. 333 p. 1916. Lippincott, \$4.

*Engineering news*, Feb. 15, 1917, p.275.

"Written by a mechanical engineer, who...has been associated with the oil business for a number of years...An exhaustive compilation of useful data and general information relating to the manufacture, selection and use of oils for lubricating purposes... [For] oil salesmen, operating engineers, mill and power plant superintendents, machine designers, purchasing agents and others."

*National engineer*, Feb. 1917, p.64.

"Reference book of data, tables and general information for the use of lubricating engineers, oil salesmen, operating engineers, mill and power plant superintendents, machinery designers and anyone who may have occasion to consider oil and lubrication problems in [their] many ramifications...It will prove a valuable addition to any man's library who has to consider oil or lubricating problems."

**Berg, Ernst J. & Upson, W. L.**

Electrical engineering; first course. 416 p. McGraw, \$4.

*Electrical review (London)*, Jan. 12, 1917, p.53.

"Some of the chapters are of the most elementary character, while others involve advanced mathematics, and would be far beyond any ordinary 'first course' student." Arrangement and treatment of many topics are poor.

*Electrical world*, Feb. 24, 1917, p.379.

"A text-book that will stand close analysis and be found concise, but comprehensive, devoted to fundamentals but intensely practical and understandable, not a mathematical treatise on theory but a useful textbook or reference."

**Beyschlag, F. and others.**

Deposits of the useful minerals and rocks, v.2; tr. by S. J. Truscott. 1,262 p. 1916. Macmillan, \$5.25.

*Engineering and mining journal*, Feb. 17, 1917, p.321.

"The second volume of Truscott's translation of the great work. The promised third volume of the original has so far not appeared...Is the most modern description of the ore deposits of the world so far issued and is rich in quotations and references...Indispensable to every student of ore deposits."

*Science progress*, Jan. 1917, p.524.

**Bingham, C.**

Manufacture of carbide of calcium. 219 p. Reggett, 5s. 6d.

*Practical engineer (London)*, Jan. 4, 1917, p.8.

"Author has had considerable experience as managing director of, or consulting engineer to, carbide of calcium factories in Europe, Mexico and in South America and has given...a very detailed account of equipment and manufacture with frequent references to problems which he himself has had to solve...Notes on electric furnace are especially worthy of attention."

**Bond, P. S.**

The engineer in war. 187 p. McGraw, \$1.50.

*Journal of the Cleveland Engineering Society*, Jan. 1917, p.264.

"Major Bond has rendered a great service to the cause of 'preparedness' by giving us his recent lectures in book form, thus making available to all engineers an invaluable introduction to the art of military engineering...The bibliography is particularly full, affording sufficient references to suit the needs of the most enthusiastic student."

**Boswell, P. G. H.**

Memoir on British resources of sands suitable for glass-making. Longmans, 1s. 6d.

*Iron and coal trades review*, Jan. 12, 1917, p.40.

**Brady, William.**

Personal health. 407 p. 1916. Saunders, \$1.50.

*American journal of public health*, Jan. 1917, p.93.

"Can be thoroughly recommended to all laymen who are interested in the matters treated."

*Mind and body*, Feb. 1917, p.480.

"Will be of great value to every one, and should be in the hands of every teacher.

It is also a good book to place in the hands of any one needing sound advice on personal health habits."

**Bragg, Edward M.**

Design of marine engines and auxiliaries. 183 p. 1916. Van Nostrand, \$3.

*Scientific American*, Feb. 10, 1917, p.162.

"A very capable work on marine engine design... Although much of the material is of necessity drawn from pre-existing sources, the time and effort spent in correlation of various findings are quite evident, and there is also much original matter on methods of general design... Author is professor of Naval Architecture at University of Michigan."

**Brown, William Alden.**

Portland cement industry. 158 p. Crosby Lockwood, 7s. 6d.

*Journal of the Society of Chemical Industry*, Jan. 15, 1917, p.50.

"Concise description is given of the processes and plant used in the manufacture of Portland cement, and the methods of testing."

*Practical engineer (London)*, Jan. 18, 1917, p.34.

Deals mainly with the design, construction and operation of the plant.

*Mining magazine*, Jan. 1917, p.58.

"Deals with the building, equipping, and economical running of a portland cement plant, and contains chapters on physical testing."

**Bryan, W. A.**

Natural history of Hawaii. 596 p. 1915. Hawaiian Gazette Co., \$5.50.

*Science progress*, Jan. 1917, p.526.

"To residents and visitors it should prove of great utility, but it also appeals to the naturalist and nature lover the world over."

**Bull, Sleeter.**

Principles of feeding farm animals. 373 p. 1916. Macmillan, \$1.75.

*Journal of the American Chemical Society*, Jan. 1917, p.177.

"Author has endeavored to present the scientific facts underlying the art of feeding animals in such a manner that the book will not only be suitable for use as a text for college courses in general feeding, but will also be valuable to the farmer who has not had a technical education in agriculture." In this task... the author has succeeded in a rather remarkable degree."

Author is associate in animal nutrition, College of Agriculture and Agricultural Experiment Station of the University of Illinois.

**Bunting, Henry S.**

Elementary laws of advertising. 192 p. Novelty Press, \$2.

*Scientific American*, Jan. 6, 1917, p.52.

"Author maintains that there are fifteen laws that govern the selling power of publicity... In this book he elucidates these laws in a highly suggestive and interesting manner."

**Bunting, Henry S.**

Premium system of forcing sales. 192 p. Novelty Press, \$2.

*Scientific American*, Jan. 6, 1917, p.52.

"Sets forth the uses and abuses."



**Burn, J. & Brown, E. H.**

Elements of finite differences. Ed.2. 289 p. 1915. Charles & Edwin Layton, 10s. 6d.

*Science progress*, Jan. 1917, p.520.

"Will continue to be useful to students of actuarial work... The principal additions... consist of a chapter on functions of two variables and one on Stirling's formula of interpolation."

**Burn, Joseph.**

Vital statistics explained. 140 p. Constable, 4s.

*Science progress*, Jan. 1917, p.520.

"Contains... some useful information apart from any special study of vital statistics."

**Cady, Hamilton P.**

General chemistry. 522 p. 1916. McGraw, \$2.25.

*Journal of physical chemistry*, Feb. 1917, p.168.

"A condensed and simplified form of the author's inorganic chemistry (17, 369). The general arrangement is much the same; the most marked difference from the earlier book is to be found in the treatment of the atomic theory."

**California.**

Report on state water problems conference; presented to the governor of California. 125 p. 1916. State, Sacramento.

*Engineering and mining journal*, Feb. 17, 1917, p.321.

"Conference acted under instructions of the California legislature to recommend a unified state policy with reference to irrigation, water storage, flood control, municipalities and drainage, with due regard to the needs of water power, mining and navigation."

**Carlson, Anton Julius.**

Control of hunger in health and disease. Univ. of Chicago Press, \$2.

*American journal of nursing*, Jan. 1917, p.373.

"One is impressed with the great amount of detail and research work which have been necessary in order to publish this book."

Author is professor of physiology, University of Chicago.

**Carslaw, H. S.**

Elements of non-Euclidean plane geometry and trigonometry. 179 p. 1916. Longmans, 5s.

*Science progress*, Jan. 1917, p.518.

"Sets forth the history and outlines of non-Euclidean geometry, for readers who possess only an elementary knowledge of mathematics."

**Caspari, Charles, jr.**

Treatise on pharmacy for students and pharmacists. Ed.5, rev. Lea.

*American journal of pharmacy*, Jan. 1917, p.42.

"There is much to commend in this volume and comparatively little of importance to criticize adversely... The very conciseness and clarity of the author's expounding of the formulas and requirements of the U. S. P. and N. F. accrue to the value of the volume and make it useful as a textbook for pharmaceutical students. Doubtless it will well serve the purpose of the author as 'a guide to the intelligent study of these two national authorities.'"

**Centnerzwer.**

Cours de manipulations de chimie physique. 182 p. 1914. Gauthier-Villars, Paris, 6 fr.

*Journal of the American Chemical Society*, Feb. 1917, p.329.

"Is rather self-contained, and should appeal in many respects to those teaching the subject."

*Nature*, Jan. 25, 1917, p.407.

"The book is orthodox according to the Ostwald school. It has been gradually evolved from teaching experience in the Riga Polytechnic and meets with the approval of Walden. It thus has much to commend it."

**Cermak, Joseph.**

Club exercises. 217 p. Author, Chicago, \$1.25.

*Mind and body*, Jan. 1917, p.431.

"A reading of the preface of this valuable booklet will convince the reader that the book will be of real service to those teachers who are trying to add that element of interest...to the much-abused 'formal' physical training work."

**Chamot, Emile M.**

Elementary chemical microscopy. 410 p. Wiley, \$3.

*Sibley journal of engineering*, Feb. 1917, adv. sec. p.8.

"Very thorough and goes into moderate detail in treating of the structure of the instruments."

**Chemical Rubber Company.**

Handbook of chemistry and physics. 410 p. 1916. Author, Cleveland, \$2.

*Scientific American*, Feb. 10, 1917, p.162.

"A great variety of useful information is packed into this handy little reference book, and it has already proved a most desirable accession for the laboratory and classroom."

**Church, A. Hamilton.**

Manufacturing costs and accounts. 452 p. McGraw, \$5.

*Iron trade review*, Feb. 22, 1917, p.479.

**Clark, Bertha M.**

Introduction to science. 479 p. Am. Bk., \$1.20.

*American food journal*, Feb. 1917, p.103.

**Clewell, C. E.**

Handbook of machine-shop electricity. 461 p. McGraw, \$3.

*American machinist*, Feb. 1, 1917, p.220.

"Should be of service in the hands of anyone who has to do with the selection, application and maintenance of electrical equipment in the machine shop."

*Electrical record*, Feb. 1917, p.78.

"The practical shop man will find this book interesting and invaluable. Its contents are applicable to his everyday work."

**Clowes, Frank, & Coleman, J. B.**

Elementary practical chemistry; ed.8, pt.2: Analytical chemistry, qualitative and quantitative. 255 p. 1916. Churchill, 3s. 6d.

*Chemical news*, Jan. 12, 1917, p.23.

"There is no better laboratory guide for students...The only defect is the rather free use of small print."

**Congdon, Leon A.**

Fight for food. 1916. Lippincott, \$1.25.

*American journal of public health*, Feb. 1917, p.197.

"Book deals in a popular manner with various problems concerning food, food laws and food adulteration. Author is in charge of the food and drug work of the Kansas State Board of Health, and was formerly employed as chemist by the states of New Jersey and North Dakota. He is, therefore, in a position to speak authoritatively on this subject."

**Coombs, R. D.**

Pole and tower lines. 267 p. McGraw, \$2.50.

*Electric railway journal*, Feb. 17, 1917, p.332.

"Devoted to the subject of overhead construction, the developments necessitated by the use of high transmission voltage being of especial importance...Discusses factors in the design of poles and towers, and gives methods of erection and testing."

**Course in foreign trade. 1916. Business Training Corporation, \$24.**

*American industries*, Jan. 1917, p.42.

"Covers in a comprehensive and well planned manner the numerous broader problems of foreign trade, without overlooking the details of export transaction. Dr. E. E.

**Course in foreign trade—continued.**

Pratt, Chief of the Bureau of Foreign and Domestic Commerce, is director of the Course and contributors are men who have had wide experience... The course consists of twelve units."

**Cowee, George Alvin.**

Practical safety methods and devices. 434 p. Van Nostrand, \$3.

*National engineer*, Feb. 1917, p.63.

"Convenient summary of standard safety methods and devices as developed and perfected by those who have specialized on the subject... Result of careful observations made in hundreds of mills and manufacturing establishments, in building and construction work, railroad operation, handling explosives and mining."

**Culbreth, David M. R.**

Manual of materia medica and pharmacology. Ed.6. Lea, \$5.25.

*Journal of the American Pharmaceutical Association*, Feb. 1917, p.222.

"Comprising all organic and inorganic drugs which are or have been official in the United States Pharmacopoeia, together with important allied species and useful synthetics, especially designed for students of pharmacy and medicine, as well as for druggists, pharmacists and physicians."

**Cumming, Alexander Charles, & Kay, S. A.**

Text-book of quantitative chemical analysis. Ed.2. 403 p. Gurney, 9s.

*Journal of the Society of Chemical Industry*, Jan. 15, 1917, p.50.

"No fundamental alteration has been made in the arrangement of this useful book, the first edition of which appeared in 1913, but the text has been revised throughout, and new methods and exercises included."

*Pharmaceutical journal and pharmacist*, Jan. 27, 1917, p.64.

"Original plan and scope of the book remain unaltered, but the text has been carefully revised. Several additional methods and a number of new exercises and diagrams have been introduced, and here and there the details of procedure have been modified slightly."

**Custom house guide. Ed.34. 304 p. H. D. Chapman, \$1.**

*Iron age*, Feb. 22, 1917, p.497.

"A guide for the use of all persons having business to transact with the Custom House. A directory of the Customs forces at the port of New York is given, together with the location of general order stores and warehouses and steamship lines and piers. Considerable export and import information is given."

**Dales, Benton, & Barnebey, O. L.**

Elementary qualitative analysis. 205 p. 1916. Wiley, 5s. 6d.

*Analyst*, Jan. 1917, p.30.

"Deals with the subject in quite an elementary manner, but with some innovations that would seem to have little to recommend them."

*Journal of the Royal Society of Arts*, Jan. 5, 1917, p.146.

"The wording is so exact and so unmistakable that the student can devote his whole attention to the subject-matter."

*Pharmaceutical journal and pharmacist*, Jan. 27, 1917, p.63.

"Specially designed for students who have had a year's work in general chemistry, and is the outcome of several years' experience, which the writers (American teachers) have had with students registered in the varied courses of a University curriculum."

**Dalziel, J. M.**

A Hausa botanical vocabulary. 119 p. T. F. Unwin, 6s. 6d.

*Nature*, Jan. 4, 1917, p.345.

"Dr. Dalziel deserves imperial thanks for producing a little book of imperial importance... The scope of the book, so far as botanical regions extend, is probably limited by the Sahara Desert on the north, the river Benue on the south, the Chad region on the east, and the course of the Middle Niger on the west."

**Demeny, G.**

Éducation physique des adolescents. 157 p. Alcan, Paris, 2 fr. 50.

*Scientific American*, Feb. 17, 1917, p.190.



**Dench, Ernest A.**

Advertising by motion pictures. 255 p. 1916. Standard Pub., \$1.50.

*American industries*, Feb. 1917, p.42.

*Druggists circular*, Feb. 1917, p.88.

"Shows why and how the screen may be employed as an advertising medium, every phase of the subject being taken up in turn by the author and many puzzling details made clear."

*India rubber world*, Jan. 1, 1917, p.206.

"Mission...is to set forth the possibilities of this latest medium for entering foreign and developing home markets."

**De Weese, Truman A.**

Keeping a dollar at work. 176 p. Nation Press.

*Printing art*, Jan. 1917, p.405.

"Presents in convenient form for the library the fifty 'talks' on newspaper advertising written by Mr. De Weese for the New York Evening Post."

**Diemer, Hugo.**

[Industrial] organization and management. 1915. La Salle Extension University.

*American industries*, Feb. 1917, p.41.

"In this volume, for the engineer and not for the layman, the author defines technical terms that are to be used and defines the types of organization, which are described in detail, with charts showing their inter-relation...There is both a table of contents and an alphabetical index."

**Dilworth, Edward C.**

Steel railway bridges. 185 p. Van Nostrand, \$4.

*Railway age gazette*, Jan. 19, 1917, p.84.

"In the preface the author states that 'it is the intention of this volume to supply practical data for the design and weight of steel for railway bridges.' This aim is carried out consistently throughout the volume."

Author is designing and contracting engineer at Pittsburgh Des Moines Steel Co., Pittsburgh Pa.

**Doehleman, Karl.**

Grundzüge der perspektive nebst anwendungen. 104 p. 1916. Teubner, Leipzig. (Aus natur u. geisteswelt, v.510.)

*Bulletin of the American Mathematical Society*, Jan. 1917, p.194.

"A short discussion on perspective well fitted for its purpose...The volumes of this series are to be written in a popular style, suitable for readers with little or no previous training in the specific line discussed by each volume."

**Dorrance, John Gordon.**

Story of the forest. 232 p. 1916. Am. Bk., \$65.

*American forestry*, Feb. 1917, p.115.

"In a most interesting and instructive way tells the younger generation what the woodlands of the country are and what they mean. The book is particularly of service in schools. It tells of the forests of America."

*Scientific American*, Feb. 17, 1917, p.190.

"Designed for use in schools...It narrates how the tree lives and dies, teaches the youthful reader how to know the commoner trees, takes him into the forest with the woodsmen and gives him some idea of the wonderful by-products of the forest; concluding with the history of trees famous by reason of their connection with the activities of our ancestors."

**Duckworth, W. L. H.**

Prehistoric man. 156 p. Putnam.

*Scientific American*, Feb. 3, 1917, p.144.

**Dunham, M. Keith.**

Automobile welding with the oxyacetylene flame. 167 p. Henley, \$1.

*American machinist*, Jan. 11, 1917, p.88.

"Each subject is illustrated, and the text is presented in a form that should prove

**Dunham, M. Keith—continued.**

of help to anyone who desires to know how to prepare and make a successful weld. The various things to be avoided... are noted."

*Scientific American*, Feb. 3, 1917, p.144.

"Users of the oxy-acetylene flame will find it very useful in acquiring a working knowledge of the fundamentals for successful repair welding."

**Edgar, J. Clifton.**

Practice of obstetrics. Ed.5. 1916. Blakiston, \$6.

*St. Paul medical journal*, Jan. 1917, p.32.

"Author has brought this excellent text book fully up to date."

**Edwards, C. A.**

Physico-chemical properties of steel. 229 p. Lippincott, \$3.50.

*Metallurgical and chemical engineering*, Feb. 1, 1917, p.167.

"A mixture of good and indifferent... For the specialist, but not entirely uniform or up to date."

**Edwin, Marion.**

The universe and the atom. 314 p. Van Nostrand, \$2.

*Electrical review and western electrician*, Jan. 6, 1917, p.42.

"An attempt to solve the riddle of the ultimate structure of matter is of interest to the natural philosopher, and this volume will find many eager readers, especially as the author has interwoven with his theory many of the puzzles of physical and chemical phenomena."

**Elderton, W. Palin, & Fippard, R. C.**

Construction of mortality and sickness tables. 120 p. 1914. Black.

*Science progress*, Jan. 1917, p.520.

"As far as it goes the book is well done."

**Eldridge, A. A. & Briscoe, H. V. A.**

First aid in the laboratory and workshop. 30 p. Arnold, 1s.

*Electrician*, Jan. 12, 1917, p.473.

"Managers of works would do well to have this little book by them."

**Elliott, Thomas J.**

Elliott's weights of steel. 662 p. Penton Pub. Co., \$20.

*Engineering news*, Jan. 18, 1917, p.107.

"The purpose of this collection of tables is to enable one to find the weight of a single piece of any section of rolled steel without having to perform the operation of multiplication."

**England—Advisory committee for aeronautics.**

Report on gyroscopic theory. 277 p. 1914. T. F. Unwin, 10s.

*Bulletin of the American Mathematical Society*, Feb. 1917, p.241.

"We have now in English a great reference book on the top, a worthy companion and counterpart to that of Klein and Sommerfeld in German, one decidedly more compact and cheaper in price."

**England—National birth-rate commission.**

The declining birth-rate; its causes and effects. 450 p. 1916. Chapman, 10s. 6d.

*Science progress*, Jan. 1917, p.521.

**Fernald, Robert H. & Orrok, G. A.**

Engineering of power plants. 586 p. McGraw, \$4.

*Power*, Jan. 9, 1917, p.66.

"One of the best for the operative engineer, who is concerned with the executive and administrative side of his occupation, that we have yet seen."

**Ferris, Charles E.**

Manual for engineers. Ed.20. 220 p. Author, Knoxville, Tenn, \$50.

*Electrical world*, Feb. 24, 1917, p.380.

"Contains many valuable tables and other data for engineers and business men."

**Firth, J. B.**

Practical physical chemistry. 178 p. 1916. Van Nostrand, \$1.

*Journal of the American Chemical Society*, Feb. 1917, p.328.

"The introduction of simple experiments on colloids is especially to be commended. The other topics are treated in conventional fashion by the apparatus and methods inherited, in common with most such manuals, from 'Ostwald-Luther.' The matter in this book is clearly presented and a copy of it should be in the hands of every instructor giving laboratory work in physical chemistry."

**Fisher, Arne.**

Mathematical theory of probabilities and its application to frequency curves and statistical methods; tr. by William Ponyngne. v.1. 1915. Macmillan, 8s. 6d.

*Science progress*, Jan. 1917, p.520.

"The excellent translation of Mr. Arne Fisher's book lies on the opposite pole of the theoretical and even metaphysical side of the subject and has the advantage of giving much continental work which is not well known in England—especially Scandinavian and Russian work."

**Flagg, Paluel I.**

Art of anaesthesia. Lippincott, \$3.50.

*American journal of nursing*, Jan. 1917, p.374.

Author is lecturer in anaesthesia, Fordham University Medical School, and anaesthetist at the Roosevelt Hospital.

**Fleming, J. A.**

Principles of electric wave telegraphy and telephony. Ed.3. 912 p. Longmans, \$10.

*Electrical world*, Feb. 24, 1917, p.379.

"The book has been carefully revised and brought up to date. It offers to the student of the radio-communication principles what is probably the most complete and comprehensive treatise in the English language."

**Folwell, A. Prescott.**

Municipal engineering practice. 422 p. Wiley, \$3.50.

*Engineering news*, Jan. 18, 1917, p.106.

"Contains much that is well designed to interest and assist various councilmanic committees and heads of municipal administrative departments, besides being particularly well adapted to the needs of city and town engineering staffs."

**Folwell, A. Prescott.**

Practical street construction. 248 p. 1916. Municipal Journal, \$2.

*Good roads*, Feb. 3, 1917, p.90.

"Consists largely of articles prepared by the editorial department of the 'Municipal Journal' during 1916."

**Franke, G.**

Handbook of briquetting. v.1: Briquetting of coals, brown coals, and other fuels; tr. by F. C. A. H. Lantsberry. 631 p. Griffin, 30s.

*Iron and coal trades review*, Jan. 12, 1917, p.40.

*Ironmonger*, Feb. 3, 1917, p.53.

"Second volume...will deal with the briquetting method adapted and applied to ores, metallurgical products, and metal swarf."

**Franklin, William S. & MacNutt, Barry.**

General physics. 604 p. 1916. McGraw.

*American journal of science*, Feb. 1917, p.168.

"The definitions of units and the statements of fundamental laws are characterized by accuracy and succinctness, and the entire text is as rigorous as possible for an elementary book."



**Fred, Edwin B.**

Laboratory manual of soil bacteriology. 170 p. 1916. Saunders, \$1.25.

*Botanical gazette*, Feb. 1917, p.155.

"Guide to teachers and students in courses given in soil bacteriology. The subject is logically developed and directions are given in clear concise form."

*Scientific American*, Feb. 17, 1917, p.190.

"Lists the necessary apparatus, tabulates the more important books and journals on the subject of bacteriology, presents exercises that have the object of quantitative results, and gives formulae and methods."

**Furman, Franklin De Ronde.**

Elementary cams. 90 p. Wiley, \$1.25.

*Mining and scientific press*, Feb. 17, 1917, p.252.

"Naturally we look for something on stamp-mill cams...but we find no mention of this important cam...The design of cams involves many problems, and in this book they will be found discussed...Mechanics will find this book of value."

**Gantt, H. L.**

Industrial leadership. Yale University Press, \$1.

*Engineering news*, Feb. 15, 1917, p.274.

"The author expresses the belief that through the observance of correct principles a system of industrialism can be developed under the democratic form of government... even more effective than anything possible under autocracy."

**Gilbreth, Frank, & Gilbreth, L. M.**

Fatigue study. 159 p. Sturgis & Walton, \$1.50.

*Iron age*, Feb. 8, 1917, p.380.

"May be considered a sequel to 'Motion Study'...It is a textbook on fatigue investigation, designed to influence further investigations in this field to increase the efficiency and 'happiness minutes' of the workers."

**Goddard, Richard E.**

General cargo. 200 p. Constable, 4s. 6d.

*Ironmonger*, Jan. 20, 1917, p.187.

"Beneath the light style and the persiflage there is a lot of solid firsthand information."

An introduction to salesmanship.

**Greene, Arthur M. jr.**

Elements of refrigeration. 472 p. 1916. Wiley, \$4.

*Canadian engineer*, Feb. 22, 1917, p.176.

"Quite complete and well worth reading by anyone interested in refrigeration."

*Compressed air magazine*, Jan. 1917, p.8250.

"There are here brought together in orderly arrangement the data for designing, constructing and operating refrigerating apparatus with theoretical discussions of the principles involved."

*Ice and refrigeration*, Jan. 1917, p.58.

"The author has collected the established data concerning the subject, arranged same in order and sequence and analyzes the principal factors concerned...It is a valuable textbook and a welcome addition to the literature on refrigeration."

**Gregory, R. A.**

Discovery; or, The spirit and service of science. Macmillan, \$1.75.

*Science*, Feb. 9, 1917, p.143.

**Guest, L. Haden.**

Nation of the future; a survey of hygienic conditions and possibilities in school and home. 115 p. 1916. Bell, 2s.

*Nature*, Jan. 25, 1917, p.407.

"Deals entirely with the welfare of the school child and with medical inspection and treatment of school children...Suited to the requirements of education committees, teachers, and health visitors, and as such may be useful."

**Guichard.**

Conférences de chimie minérale; Métaux. Ed.2. 422 p. 1916.  
Gauthier-Villars, Paris, 15 fr.

*Revue générale des sciences pures et appliquées*, Jan. 15, 1917, p.28.

**Hadley, H. E.**

Manual of practical physics. 265 p. 1916. Macmillan, 3s.

*Science progress*, Jan. 1917, p.523.

"A collection of some 160 recipes for performing experiments in Physics up to intermediate pass standard. Very excellent recipes they are too, the author's reputation as a writer of elementary text-books is a sufficient guarantee of that."

**Halsey, F. A.**

Handbook for machine designers, shop men and draftsmen. Ed.2,  
rev. 561 p. McGraw, \$5.

*American machinist*, Feb. 1, 1917, p.220.

"The rapid accumulation of essential information in the field of this book during the brief period of three years has made extensive additions and revisions necessary. In the revision gaps in the information presented in the first volume have been filled and some subjects have been rewritten in the light of additional information."

*Engineering news*, Feb. 15, 1917, p.275.

*Power*, Feb. 20, 1917, p.266.

"The first volume had a total of 494 pages. The new edition has 67 pages more... The original scheme of the book—that is the profuse use of charts and graphical plotting has been continued."

**Harbord, F. W. & Hall, J. W.**

Metallurgy of steel. 2v. Griffin.

v.1. Metallurgy.

v.2. Mechanical treatment.

*Engineering and mining journal*, Feb. 17, 1917, p.321.

**Harding, Louis Allen, & Willard, A. C.**

Mechanical equipment of buildings. v.1: Heating and ventilation.  
615 p. 1916. Wiley, \$4.

*Canadian engineer*, Jan. 25, 1917, p.90.

"The present book without doubt contains the best and most complete information of any book so far published in connection with heating and ventilation... A pocket book quite as valuable along this line as Kent's."

*Engineering news*, Feb. 15, 1917, p.277.

"The authors have produced an admirable text and reference book on the subject of heating and ventilation of buildings. It appears to be the most up to date and complete book yet published upon this subject. It contains many original and valuable tables and charts."

*National engineer*, Feb. 1917, p.64.

"A veritable mine of information on this particular subject and on a number of allied subjects. It is one of the most comprehensive and thorough treatises on the subject that has come to our attention, both from a practical and technical point of view."

**Hardy, G. H.**

Integration of functions of a single variable. Ed.2. 67 p. 1916.  
Cambridge University Press, 2s. 6d. (Cambridge tracts in mathematics  
and mathematical physics, no.2.)

*Science progress*, Jan. 1917, p.518.

"Probably the most useful tract in the whole series for one who means to study mathematics systematically."

**Hare, Hobart Amory, and others.**

National standard dispensatory. Ed.3, rev. and enl. 2,103 p. 1916.  
Lea, cloth, \$9.50; leather, \$11.50.

*American journal of pharmacy*, Feb. 1917, p.90.

"The information which is given, even though incomplete, may be relied upon as being more or less accurate."

**Hare, Hobart Amory, and others—continued.**

*Journal of the American Pharmaceutical Association*, Jan. 1917, p.109.

"As this review is purely pharmaceutical no comments, whatever, on therapeutics are submitted. . . Another revision of this third edition should be promptly made so as to correct the numerous errors."

**Harrison, Newton.**

Electric wiring diagrams and switchboards. Ed.2. 303 p. Henley, \$1.50.

*Electrical record*, Jan. 1917, p.67.

"In addition to the matter contained in the first edition. . . the author has added chapters on transformers and measuring instruments. Special attention is called to the clear way in which the author treats the usually puzzling subjects of reactance and capacity."

**Heath, George L.**

Analysis of copper and its ores and alloys. 292 p. 1916. McGraw, \$3.

*Journal of industrial and engineering chemistry*, Feb. 1917, p.220.

"Mr. Heath has done a tremendous service to analytical chemists in placing at their service so comprehensive and authoritative a work."

**Heaton's annual; the commercial handbook of Canada and boards of trade register.** 1917. Heaton's Agency, Toronto, \$1.25.

*Engineering and mining journal*, Feb. 17, 1917, p.321.

"Statistics relative to the industrial and economic conditions in the provinces of Canada; 18 pages are devoted to mineral production figures and location of minerals of economic importance."

*Iron age*, Jan. 18, 1917, p.207.

**Hedges, Charles Cleveland, & Bryant, W. T.**

Laboratory manual of agricultural chemistry. 94 p. 1916. Ginn, \$60.

*Scientific American*, Jan. 6, 1917, p.52.

"This laboratory guide, compiled by experienced instructors, is designed to accompany a course in theory of agricultural chemistry; the manual assumes a knowledge on the part of the student of general or inorganic chemistry, but not necessarily of quantitative analysis."

**Heller, A. H.**

Stresses in structures. Ed.3, rev. 374 p. 1916. Wiley, \$2.75.

*Canadian engineer*, Jan. 25, 1917, p.91.

"As a text book to be read in conjunction with a course of lectures it would be very useful. . . The busy engineer who wishes to refresh his memory, or to get information on some of the subjects covered in the book, will be able to do so with a minimum amount of reading."

**Herms, William B.**

Medical and veterinary entomology. 393 p. 1915. Macmillan, 17s.

*Science progress*, Jan. 1917, p.539.

"While dealing more intimately with the American fauna, yet provides a good account of parasitic forms in general. It is not intended as a comprehensive treatise, but, rather, is written with the object of systematising the subject."

**Higgins, A. Lovat.**

The slide rule; its operation and digit rules. 13 p. Whittaker, 4d.

*Electrician*, Jan. 12, 1917, p.473.

**Higgins, S. H.**

Dyeing in Germany and America. Ed.2. 143 p. Longmans, 5s.

*Journal of the Society of Chemical Industry*, Jan. 15, 1917, p.50.

"This book of which the first edition appeared in 1907 gives a general survey of the dyeing and allied industries of the United States and Germany, the material for which was collected during a tour of these countries in 1905-6. No further visit has been paid to either of these countries, but a considerable amount of new matter has been added as a result of experience gained in the dyehouse of the Municipal School of Technology, Manchester, and later as chemist and manager of a bleaching works."



Hill, Lewis Webb.

Manual of practical laboratory diagnosis. 1916. Leonard, \$1.50.

*St. Paul medical journal*, Feb. 1917, p.64.

"Intended for students, house officers and general practitioners. Only the practical tests are to be found here... Altogether this is an excellent pocket manual."

Hinneberg, Paul.

Die kultur der gegenwart. Teil 3, abtlg. 3: Physik. 762 p. 1915. Teubner, Leipzig.

*Science*, Jan. 12, 1917, p.45.

"The philosophical evolution rather than the history of physics... All of the material contained in these...36 articles that make up this volume... can be found scattered through the earlier handbooks or the recent scientific periodicals."

Hirshfield, C. F. & Ulbricht, T. C.

Steam power. 400 p. 1916. Wiley, \$2.

*Engineering news*, Feb. 15, 1917, p.278.

"The great majority of attempts to popularize steam-engineering texts is marked by the neglect of thermodynamics and deeper theory. The authors... have jumped out of the rut and attempted to lay bare some of the physical concepts of the inner details of steam-power practice. The extent of their success will surprise many mechanical engineers."

*National engineer*, Feb. 1917, p.63.

"Essentially a practical textbook, and the large number of carefully chosen illustrations and the problems based upon each chapter will be found especially valuable in fixing the principles in the student's mind."

*Sibley journal of engineering*, Jan. 1917, p.113.

"The authors, both former members of the Sibley faculty, have given us a comprehensive yet simple, discussion of the operation of steam power plant apparatus, together with the development of a simple, common-sense view of thermodynamic processes."

Holms, A. Campbell.

Practical shipbuilding. Ed.3. 2v. 1916. Longmans, \$17.50.

*International marine engineering*, Feb. 1917, p.76.

"Revision has been extensive and thorough. Large portions have been entirely rewritten and the whole has been brought up to date by numerous additions, alterations and amendments. Three new chapters have been added on longitudinal framing, damage repairs and lifeboats and davits... The index has been carefully revised and amplified."

Holt, Andrew H.

Manual of field astronomy. 125 p. 1917. Wiley, \$1.25.

*Canadian engineer*, Feb. 22, 1917, p.177.

"May confidently be recommended to the busy engineer who has little time to devote to this subject."

*Engineering record*, Feb. 17, 1917, p.276.

"This text-book for use in civil engineering courses bases its principal claim upon conciseness, and yet completeness, in its treatment of fundamentals... Practising engineers who only occasionally have to make astronomical observations will find it especially helpful."

Homans, J. E.

First principles of electricity. 248 p. Sully & Kleinteich, \$1.

*Railway mechanical engineer*, Jan. 1917, p.4.

"Defines electricity and interprets the various terms used in connection with it. It explains the various sources from which electricity may be obtained, giving a description and explaining the purpose of the direct and alternating current dynamos and motors, explaining the principles upon which they work."

Horstmann, Henry C. & Tousley, V. H.

Electrical tables and engineering data. 331 p. Drake, \$1.

*Electric journal*, Feb. 1917, p.38.

**Hosmer, George L.**

Azimuth. Ed.2. 73 p. 1916. Wiley, \$1.

*Canadian engineer*, Feb. 22, 1917, p.177.

"The subject of azimuth has here been presented in such a manner 'that a person who is unfamiliar with astronomy will be able to apply these methods and obtain satisfactory results without taking the time to completely master the theory underlying the method and use'... Altogether the author has well fulfilled his purpose of presenting a compact volume for use by the engineering profession."

**Howe, Henry M.**

Metallography of steel and cast iron. 641 p. 1916. McGraw, \$10.

*Journal of physical chemistry*, Feb. 1917, p.165.

"A monumental piece of work and the reproductions of the micrographs are astonishingly well done."

**Hurley, Edward N.**

Awakening of business. 240 p. Doubleday, \$2.

*American machinist*, Feb. 1, 1917, p.220.

"This stimulating and tremendously interesting book is a message to American business men from Chairman Hurley, of the Federal Trade Commission. The book cannot be too highly recommended for the reading of manufacturers and business men at this particular time."

*Iron trade review*, Feb. 1, 1917, p.318.

"An exceedingly interesting treatise on business conditions in this country today and on the changes which will have to take place in our business methods before we rest assured that when world competition is once again in full swing we will take our proper place in international affairs."

*Journal of accountancy*, Feb. 1917, p.160.

"He presents a careful analysis of the principal weaknesses of American business, draws inferences from contemporary business abroad, and, with his eye upon the probabilities of conditions after the war, points to what he believes should be the policies of American commerce and industry."

**Huston, J. A.**

Historical sketch of the Government printing office.

*Inland printer*, Jan. 1917, p.533.

An unofficial historical and informational sketch of the Government printing office, designed to acquaint the general public with this division of the Government activities.

**Ichak, F.**

Das perpetuum mobile. 104 p. 1914. Teubner, Leipzig, 1 m. 25. (Aus natur u. geisteswelt, v.462.)

*Bulletin of the American Mathematical Society*, Jan. 1917, p.193.

"This little book does not claim to be an exhaustive treatise on the subject, but does cover the field remarkably well in such short space."

**Innes, C. H.**

The fan; including the theory and practice of centrifugal and axial fans. [Ed.2.] 302 p. Tech. Pub. Co., 8s. 6d.

*Electrician*, Jan. 26, 1917, p.527.

"The present edition... has been thoroughly revised... The new matter dealing with recent practice... is note-worthy... Deserves to be carefully studied by all those interested in the theory and practice of centrifugal and axial fans."

**Innocent, C. F.**

Development of British building construction. 294 p. Cambridge University Press, 10s. 6d.

*Practical engineer (London)*, Jan. 18, 1917, p.34.**Jackson, Benjamin Daydon.**

Glossary of botanic terms, with their derivation and accent. Ed.3. 428 p. 1916. Lippincott, \$3.

*Botanical gazette*, Feb. 1917, p.156.

"It must be regarded as complete and trustworthy as such a book can be. It contains approximately 21,000 terms, so that it must be fairly representative of botanical terminology."

**Jamieson, A.**

Text-book of applied mechanics and mechanical engineering. v.1:  
Applied mechanics; ed.10, rev. by E. S. Andrews. 371 p. Griffin, 6s.

*Practical engineer (London)*, Jan. 18, 1917, p.34.

"This classic of engineering education was worthy of the thorough care with which it has been overhauled and 'brought up to date.'"

**Jansky, Cyril M. & Faber, D. C.**

Principles of the telephone. pt.1: Subscriber's apparatus. 160 p.  
McGraw, \$1.50.

*Electrical record*, Jan. 1917, p.67.

"In general it might be added that the subject matter is treated with sufficient detail to familiarize the student with the construction of the apparatus, the function of its various parts, and the principles underlining (*sic*) their operation."

*Electrical world*, Feb. 10, 1917, p.281.

"First of a series of three courses devoted to the principles of the telephone is contained in this volume, which is confined mainly to subscribers' apparatus. The two parts which are to follow, treating of central office equipment and outside construction, are in preparation. Attention is given to both the Bell and the independent apparatus."

**Johnson, Emory R.**

The Panama canal and commerce. 296 p. Appleton, \$2.

*Engineering*, Jan. 18, 1917, p.107.

"There is no higher authority on the subject covered by this book than Professor Johnson."

**Johnson, Emory R. & Van Metre, T. W.**

Principles of railroad transportation. 620 p. Appleton, \$2.50.

*Railway age gazette*, Jan. 19, 1917, p.84.

"A revision of, or rather a new book based on, Professor Johnson's American Railway Transportation, which during the many years since its first appearance in 1903 has held an enviable position as one of the leading text books on the subject...Primarily meant for the newcomer to railway problems."

**Johnson, Roswell H. & Huntley, L. G.**

Principles of oil and gas production. 1916. Wiley, \$3.75.

*Canadian mining journal*, Feb. 1, 1917, p.62.

"Discussion of the subject with reference to American conditions. The authors have attempted to treat more fully the newer, less developed topics and less fully those that have a literature. Methods of locating and extracting oils are given prominence."

*Geological magazine*, Jan. 1917, p.38.

"A large proportion of its pages is devoted to geological considerations. To the European student it is also welcome inasmuch as it emphasizes the essentially American aspect of the subject."

**Jones, B. E. ed.**

Electric bells and telephones. 154 p. Cassell, 1s.

*Electrician*, Jan. 5, 1917, p.447.

"Contains a clear outline of all the practical details of...installation...in a private house."

**Jones, Edward D.**

Administration of industrial enterprises with special reference to  
factory practice. 1916. Longmans, \$2.

*American industries*, Feb. 1917, p.42.

"Could be used as a text book, so detailed are different phases discussed, indeed the style suggests the classroom and the student rather than the lay reader...The book has an index, and...bibliographies at the end of each chapter."

**Jones, Edward Groves, & Bunce, A. H.**

Outlines of physiology. Ed.4. 373 p. 1916. Blakiston, \$1.50.

*Scientific American*, Jan. 6, 1917, p.52.

"As a brief outline of modern physiology in its relation to the practice of medicine this text is markedly successful. The issuance of a fourth edition has made possible a number of changes in detail."



**Kapp, Gisbert.**

Principles of electrical engineering and their applications. v.1:  
Principles. 356 p. 1916. Arnold, 15s.

*Science progress*, Jan. 1917, p.533.

"Sums up in 350 pages all the knowledge that any engineer wants of general electrical engineering distribution problems."

**Karapetoff, Vladimir.**

Engineering applications of higher mathematics. 5v. Chapman,  
3s. 6d. each.

*Practical engineer (London)*, Jan. 4, 1917, p.8.

"Mainly the result of problems which presented themselves during a lengthy course of teaching at Cornell University... There are short bibliographies in each part."

**Karapetoff, Vladimir.**

Engineering applications of higher mathematics: pt.5: Electrical  
engineering. 65 p. Wiley, \$1.75.

*Canadian engineer*, Feb. 22, 1917, p.178.

"Those wishing assistance toward skill in applying mathematics to engineering problems will find in this book many suggestions and sample applications."

**Kempe, H. R.**

Alternating currents. 83 p. Appleton.

*Electrical review and western electrician*, Jan. 27, 1917, p.169.

"As one compares this eighty-page booklet with some of the standard texts on alternating currents, he begins to wonder what the author had in mind in publishing it."

**Kent, Robert Thurston.**

Leather belting. 114 p. Wiley, \$1.25.

*American machinist*, Feb. 22, 1917, p.352.

"Is commended as gathering together in one place and in permanent and easily usable form the best of our knowledge in regard to practice in using leather belting."

**Keyes, Frederick G. & Brownlee, R. B.**

Thermodynamic properties of ammonia. 74 p. 1916. Wiley, 4s. 6d.

*Science progress*, Jan. 1917, p.531.

"Computed for the use of engineers from experimental data derived from investigations made at the Massachusetts Institute of Technology."

**Keyser, Cassius J.**

Human worth of rigorous thinking. 314 p. 1916. Columbia Uni-  
versity Press, \$1.75.

*Scientific American*, Jan. 6, 1917, p.51.

"Fifteen papers previously published by well-known scientific and philosophical magazines. It would be a pity if any of these high-sounding titles should frighten away the general reader, for in very few instances does Dr. Keyser become so technical that the man of fair intelligence cannot follow him."

**King, Mrs Frances.**

Well considered garden. 290 p. Scribner.

*American forestry*, Feb. 1917, p.115.

"This attractive book, profusely illustrated is by an author whose practical knowledge, keen insight, and splendid enthusiasm combine to make her so well fitted to instruct, advise and inspire lovers of plants and gardens, that it will be found by all of these of unusual practical value."

**Kinne, Helen, & Cooley, Anna.**

Clothing and health. 302 p. 1916. Macmillan, \$1.65.

*Journal of home economics*, Feb. 1917, p.91.

"Written for the purpose of giving girls of elementary school age a knowledge of sewing and garment making. Unless the whole book were quoted its good points could not all be told, for every page brings its helpful suggestion."

**Kober, George L. & Hansen, W. C. ed.**

Diseases of occupation and vocational hygiene. 918 p. Blakiston, \$8.

*Metallurgical and chemical engineering*, Feb. 1, 1917, p.167.

**Koopman, Harry Lyman.**

The booklover and his books. 196 p. Boston Bk., \$2.

*Printing art*, Feb. 1917, p.477.

"Dr. Koopman has brought together in substantial and permanent form his essays on the physical make up of the perfect book. . . A valuable addition to the literature intended to assist in the making of better books."

**Krogh, August.**

Respiratory exchange of animals and man. 173 p. 1916. Longmans, 6s. net. (Monographs on biochemistry.)

*Science progress*, Jan. 1917, p.534.

"Deals chiefly with the quantitative aspect of this exchange and takes no count of the physiological mechanisms involved, but. . . is, within its limits, a really exhaustive review of the subject. . . Subject-matter is chemical rather than physical. . . a full bibliography is appended. . . The monograph is one of the best of an excellent series."

**Lahee, Frederic H.**

Field geology. 508 p. 1916. McGraw, \$3.

*American journal of science*, Feb. 1917, p.172.

"Gives the student those criteria which, on the one hand, will enable him to understand what he sees in the field and on the other will suggest to him the data that should be searched for to gain a solution of his problem. . . Commended for examination to all teachers who have courses in field geology."

*Canadian mining journal*, Feb. 1, 1917, p.62.

"Will be useful not only to students of geology, but also to engineers whose interest brings them into touch with geologic problems. An elementary knowledge of geology. . . is assumed."

*Engineering and mining journal*, Feb. 17, 1917, p.321.

*Science*, Feb. 16, 1917, p.166.

"It is as a reference book in the field, that it will be found. . . to be especially valuable."

**Lane-Clayton, Janet E.**

Milk and its hygienic relations. 348 p. 1916. Longmans, \$2.50.

*Journal of home economics*, Jan. 1917, p.41.

"A well-documented encyclopedia of the subject and more."

Author is assistant medical inspector under the Local Government Board, for the Medical Research Committee of Great Britain.

*Science*, Feb. 23, 1917, p.190.

"Foreign sources have been drawn upon exhaustively, and complete bibliographies are listed at the end of each chapter. . . A most valuable contribution to our literature on milk."

*Science progress*, Jan. 1917, p.538.

"Dr. Lane-Clayton has gone into the subject with her well known care, with the result that in one volume there is comprised not only the results of her own investigations, but those of a very large number of British and foreign workers. The facts are stated clearly and succinctly, and are presented in an interesting and a readable manner."

**Larsen, C. & White, William.**

Dairy technology. 298 p. Wiley, \$1.50.

*American food journal*, Feb. 1917, p.103.

"Treats all the dairy industry with the exception of butter and cheese, and it is authentic, up-to-date and scientific."

**Larson, Carl W.**

Milk production cost accounts; principles and methods. 60 p. Columbia University Press.

*Journal of accountancy*, Jan. 1917, p.80.

"This paper book of 60 pages is not, as its somewhat misleading title would imply, a textbook for students of cost systems or for farmers and dairymen, but a study of the

**Larson, Carl W.**—*continued.*

economics of milk production based on federal and state agricultural bulletins, reports of investigating committees, etc."

**Lawrence, Ralph R.**

Principles of alternating-current machinery. 603 p. McGraw.

*Electric railway journal*, Feb. 17, 1917, p.332.

"Deals with the construction of alternating-current machines and the principles of their operation...Is not essentially a book on design, although calculations are given to analyze the electrical theory underlying various details of construction and winding."

**Lewis, E. R.**

Winter track work. 175 p. Railway Educational Press, \$1.60.

*Canadian engineer*, Feb. 22, 1917, p.176.

"A notable addition to track literature...There is much of value in this book...not only for the trackman but for the operating man, the traffic man and everyone who is concerned with keeping tracks clear and traffic open in winter."

**Lewis, John H.**

Bridge manual; containing general information and instructions. State of Oregon, Salem.

*Engineering news*, Feb. 15, 1917, p.277.

"While intended primarily for the use of the county courts in Oregon in all matters pertaining to construction, maintenance and repair of bridges and culverts, this manual...has been prepared for distribution to various county roadmasters, surveyors, supervisors, etc., in an effort to standardize practice throughout the state in the construction of bridges and culverts."

**Lewis, William C. M.**

System of physical chemistry; ed. by Sir William Ramsay. 2v. 1916. Longmans.

v.1. Kinetic theory. 523 p. 9s.

v.2. Thermodynamics and statistical mechanics. 552 p. 9s.

*Electrical world*, Feb. 10, 1917, p.281.

"One of a series of text-books on physical chemistry edited by Sir William Ramsay and issued by the same publisher."

*Science progress*, Jan. 1917, p.523.

"Embraces the whole subject so far as advancement has been made in this domain of science...Fact and theory are carefully weighed up together and their bearing on one another evaluated."

**Lotsy, J. P.**

Evolution by means of hybridization. 166 p. 1916. Nijhoff, The Hague.

*Botanical gazette*, Feb. 1917, p.153.

"The reviewer would like to recommend the reader to the second edition of this book, which, if it ever appears, will doubtless be a considerable improvement on the first."

**Luckiesh, M.**

Light and shade and their applications. 265 p. 1916. Van Nostrand, \$2.50.

*Journal of physical chemistry*, Jan. 1917, p.75.

"Less definite and consequently less interesting than the companion volume on 'Color and Its Applications' (20: 539). It is a valuable book containing many exceptionally interesting paragraphs."

**Lunge, George.**

Coal tar and ammonia. Ed.5, enl. 3v. 1,658 p. 1916. Van Nostrand, \$18.

*Journal of industrial and engineering chemistry*, Feb. 1917, p.215.

"Very much enlarged over preceding edition in mere bulk; has had new matter added and scarcely anything eliminated. It is difficult, if not impossible, to pick out



**Lunge, George—continued.**

the accepted practice and facts from the discarded practice or theory. Unfortunately the work is now neither a complete reference work, an up-to-date statistical work, nor a practical hand book. The coal-tar and ammonia industry in the United States has received but scant reference."

**Lusk, Graham.**

Fundamental basis of nutrition. 62 p. Yale University Press, \$5.00.

*American food journal*, Jan. 1917, p.42.

"The matter of dietaries is discussed both historically and in the light of present knowledge, the last few pages being devoted to data descriptive of the articles of food sold by Child's restaurant in New York City."

**Lyndon, Lamar.**

Hydroelectric power. 2v. McGraw.

v.1. Hydraulic development and equipment. 499 p. \$5.

v.2. Electric equipment and transmission. 360 p. \$3.50.

*Canadian engineer*, Jan. 25, 1917, p.90. (Review of v.2.)

"The author has covered very completely the subjects enumerated and the book will be found very valuable not only to the student but also to the engineer. The chapter on calculation of transmission lines is perhaps the best in the book."

*Engineering record*, Feb. 10, 1917, p.235.

"In scope the book is excellent; it touches on almost all phases of plant design and defines the principles governing design very well."

**Macfarlane, Alexander.**

Lectures on ten British mathematicians of the nineteenth century. 148 p. 1916. Wiley, \$1.25. (Mathematical monographs, no.17.)

*Bulletin of the American Mathematical Society*, Jan. 1917, p.191.

*Engineering news*, Jan. 18, 1917, p.110.

"Dr. MacFarlane's book, which is a collection of lectures delivered by him at Lehigh University, should appeal to all students of human nature."

*Science*, Jan. 26, 1917, p.88.

"This posthumous publication contains most interesting biographies of ten of the leading mathematicians of the nineteenth century in Great Britain...Carelessness in proof reading is noticeable."

**McGegan, J. E.**

Star identifier and diagrams for the graphical solution of problems in nautical astronomy. 1916. J. D. Potter, 10s. 6d.

*Nature*, Jan. 25, 1917, p.406.

"By the pamphlet and diagrams prepared by Mr. McGegan he suggests a method by which, when an observer has taken an altitude of a star the identity of which is doubtful, he can, if he also observes the compass bearing of the object at the same time, ascertain its declination and right ascension, and thus identify it in the Nautical Almanac."

**McKay, G. L.**

Principles and practice of butter-making. 351 p. Wiley, \$1.50 net.

*American food journal*, Feb. 1917, p.103.

"Confined to the subject of the commercial manufacture of butter, and is at one and the same time both scientific and practical."

**Mackenzie, James.**

Principles of diagnosis and treatment in heart affections. 1916. Oxford, \$2.50.

*St. Paul medical journal*, Jan. 1917, p.32.

"Contains some rather startling opinions...There is much food for thought...The author in his pleasing style writes on the essentials, diagnosis and treatment of a subject which concerns every physician."

**McLennan, Evan.**

Cosmical evolution, critical and constructive. Ed.2. 490 p. 1916. Author.

*American journal of science*, Feb. 1917, p.169.

"The only use to which the text can be put is to furnish teachers of elementary logic with numerous simple illustrations of logical fallacies."

**McWane, R. C.**

Pipe and the public welfare. 165 p. Stirling Press, \$1.

*Iron age*, Feb. 22, 1917, p.497.

"A convincing argument for the use of cast-iron pipe for water and gas mains... Mr. McWane... draws from a great many sources and authorities to prove his contention that cast iron... is superior to wrought iron or steel in conduits which are exposed to corrosion, electrolysis or other deleterious action, except, perhaps, for very high pressures or for temporary use."

*Iron trade review*, Feb. 8, 1917, p.379.

"The various processes through which iron passes in the manufacture of cast iron, wrought iron and steel pipe are clearly and interestingly described."

*Metallurgical and chemical engineering*, Feb. 15, 1917, p.233.

"This little volume was written for the purpose of showing the advisability of using cast-iron pipe for conduits... Gives a review of materials... followed by a long discussion on metal pipe deterioration... mostly in the nature of practical evidence of the rust-resisting qualities of cast iron."

*Railway age gazette*, Feb. 16, 1917, p.256.

"Deals with the history, manufacture and durability of water pipe with particular reference to pipe made of cast iron... Historical section reviews... water supplies of London, Philadelphia, New York and Boston."

**Magnusson, Carl Edward.**

Alternating currents. 525 p. McGraw, \$4.

*Engineering news*, Jan. 18, 1917, p.110.

"Treatment is of theory, not heavily loaded with field and shop practicalities and aims to help students gain an idea of internal reactions and to handle certain physical facts in mathematical shorthand. The chief feature of originality lies in pushing the study of transmission lines farther than common with undergraduates."

**Mangoldt, Hans von.**

Einführung in die höhere mathematik. 3v. 1911-14. Hirzel, Leipzig.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.182.

"An important contribution toward the solution of a problem which is of great concern to the majority of teachers of mathematics."

**Mansfield, William.**

Histology of medicinal plants. 1916. Wiley.

*American journal of pharmacy*, Feb. 1917, p.89.

"Will be found valuable in courses of histology where there are well-trained teachers to handle the subject and interpret the author's drawings and statements."

Incomplete or misleading in several respects. Incomplete index.

*Druggists circular*, Feb. 1917, p.88.

"Has a real value in the retail store—the retail store of the pharmacist who is more than a retailer of merchandise."

**Marks, Lionel S. ed.**

Mechanical engineers' handbook. 1,836 p. Hill, 21s.

*Electrician*, Jan. 26, 1917, p.527.

"In looking through the book one is impressed by the vast mass of engineering theory and practice compressed into its pages, and by the care... taken to secure accuracy... It would have been preferable not to employ learned 'electrical' men for the section on electrical engineering... In our opinion the greater part of the section is likely to be more useful to electrical engineers than to mechanical engineers."

*National engineer*, Feb. 1917, p.63.

"Represents the very latest and best practice."

**Marr, J. E.**

Geology of the lake district and the scenery as influenced by geological structure. 220 p. 1916. Cambridge University Press, 12s.

*Nature*, Jan. 4, 1917, p.345.

"The author has succeeded admirably in the difficult task of producing a book which will be both interesting and instructive to the general reader as well as valuable to the serious student."

**Marshall, P. & Marshall, A. W.**

Engineering as a career. 51 p. Marshall, 6d.

*Electrician*, Jan. 5, 1917, p.447.

"Is likely to be useful to parents and guardians, and to help to a proper understanding of what an engineering career really is."

**Martin, G. & Dancaster, E. A.**

Text book of inorganic chemistry. v.8: The halogens. 337 p. Lipincott, \$3.

*Metallurgical and chemical engineering*, Feb. 15, 1917, p.233.

"Although numbered VIII in the series, it is the second to be issued...Authors emphasize the idea that the work is not intended to be exhaustive, that technical details are briefly touched upon, and that most attention is given to the chemical and physical properties of the elements concerned...The consequence...is that the work is...neither an inspiring text-book, nor a complete hand-book, but it has a certain value as a reference book."

**Martin, Louis A.**

Text-book of mechanics. v.6: Thermodynamics. 313 p. 1916. Chapman, 7s. 6d.

*Science progress*, Jan. 1917, p.530.

"For the use of engineering students who have no previous acquaintance with thermodynamics, but who possess some knowledge of the rudiments of the calculus."

**Mason, William P.**

Water supply. Ed.4. 528 p. Wiley, \$3.75 net.

*American journal of public health*, Feb. 1917, p.197.

"Professor Mason is always a pleasing writer and has the art of abstracting the important data from the writings of others and presenting them in an attractive form. Although this cannot be called an exhaustive treatment of the subject, it is one of the most interesting and suggestive treatises on water supplies published since the old book of the same title by Professor William Ripley Nichols of the Massachusetts Institute of Technology."

*Engineering record*, Feb. 10, 1917, p.235.

"A thoroughly modern treatise of water supply from the sanitary standpoint...not intended as a treatise on the other elements of water supply."

**Matteson, Emma B. & Newlands, E. M.**

Laboratory manual of foods and cookery. 325 p. 1916. Macmillan, \$1.50.

*Journal of home economics*, Feb. 1917, p.91.

**Mavor, James.**

Government telephones. 176 p. Moffat, \$1.

*Electrical review and western electrician*, Jan. 27, 1917, p.169.

"Interesting record of the management by the government of the telephone system in Manitoba, Canada."

**Mechanical world pocket diary and yearbook.** [Ed.30.] 330 p. Remington, \$35.

*American machinist*, Feb. 22, 1917, p.352.

"Several new features have been introduced. The section on steam and steam engines has been largely rewritten. New tables have been introduced giving dimensions of piston rings and governors; notes on lubrication and antifriction bearings are included. New section on the heat treatment of steel has been introduced."

**Megraw, Herbert A.**

The flotation process. 249 p. 1916. McGraw, \$2.50.

*Journal of physical chemistry*, Feb. 1917, p.167.

"Intended primarily for the engineer and mine-operator and it aims accordingly to give a summary of the status of ore-flotation, particularly as it has been developed in America up to the present...The book as a whole is a useful one."

*Mining American*, Feb. 17, 1917, p.7.

"To say that Mr. Megraw's book covers the ground succinctly and accurately is a



**Megraw, Herbert A.—continued.**

sufficient recommendation... For those who are desirous of securing a comprehensive knowledge of this subject... the book is a good beginning."

*Mining magazine*, Jan. 1917, p.56.

"Shows signs of hasty compilation... Any book which helps to throw light on the subject of flotation and keeps the engineer abreast of the work being done must be welcome, and one only regrets that this book should so closely follow that of Mr. Rickard."

**Mendel, Lafayette B.**

Changes in the food supply and their relation to nutrition. 62 p. Yale University Press, \$50 net.

*American food journal*, Jan. 1917, p.42.

"Address... before the Pan-American Congress in December 1915... Starting with an historical review of all the various prophecies as to probable sources of food supply for coming generations, the author, in most interesting fashion, describes briefly the present conditions under which food is now being brought to the consumer."

**Merriman, Mansfield.**

Treatise on hydraulics. Ed.10, rev. 565 p. Wiley, \$4 net.

*Engineering news*, Feb. 15, 1917, p.274.

"A distinguishing characteristic of Merriman's 'Hydraulics' is lucidity of style. In the tenth edition the practice of presenting a full explanation and less purely mathematical discussion is carried even farther than in earlier editions. The smooth, lucid, easy style gives to the demonstration of formulas a simplicity and naturalness that is very pleasing—likewise easily forgotten."

**Meyer, E. B.**

Underground transmission and distribution for electric light and power. 312 p. 1916. McGraw, \$3.

*Canadian engineer*, Feb. 22, 1917, p.176.

"A valuable addition to existing literature on this subject, and is recommended to engineers and others interested in this class of work."

*Electric railway journal*, Feb. 17, 1917, p.332.

"Deals with the operation of underground systems for distributing electrical energy for lighting and power purposes... Assumes that the reader understands the principles underlying electrical theory."

**Miessner, B. F.**

Radiodynamics; the wireless control of torpedoes and other mechanisms. 206 p. Van Nostrand, \$2.

*Electrical world*, Feb. 10, 1917, p.281.

"In spite of its evident weakness... the reader is likely to find some information of interest in the descriptive chapters."

**Miller, G. A.**

Historical introduction to mathematical literature. 302 p. 1916. Macmillan, 7s.

*Science progress*, Jan. 1917, p.516.

"Will be found far more useful as a book of hints to a teacher who knows how to select and construct than to a student."

Lacks fullness along certain lines, and presents statements that are open to criticism.

**Minchin, George M.**

Treatise on statics. Ed.5. 1915. Clarendon Press.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.195.

"In this latest edition 467 examples have been added in an appendix, also a very few in the text, while the original number of the articles in the fourth edition has been retained. Three entire chapters of the fourth edition have been omitted... Certain other omissions have been made. Otherwise this edition is a verbatim reproduction of the fourth edition."

**Molesworth, Walter H.**

Spon's electrical pocket-book. 488 p. Spon, \$1.75.

*Canadian engineer*, Jan. 25, 1917, p.91.

"Handy and useful compilation covering, for its size, a very considerable range of data, mainly electrical, of which a good portion will be of general utility anywhere."

**Montgomery, E. E.**

Care of patients undergoing gynecologic and abdominal procedures before, during and after operation. 149 p. 1916. Saunders, \$1.25.

*American journal of nursing*, Feb. 1917, p.461.

"Though written chiefly for young surgeons, there is much in it of value to nurses."

*Pennsylvania medical journal*, Feb. 1917, p.380.

"Dr. Montgomery has rendered a useful service in providing this guide for intern, nurse and novice, and coming from so experienced a source it carries with it a definite weight of authority."

**Moon, Frederick Franklin.**

Book of forestry. 315 p. 1916. Appleton, \$1.75.

*American forestry*, Feb. 1917, p.115.

"The author, professor of forest engineering, New York State College of Forestry, Syracuse, states in preface: 'The American people are by inheritance, a nation of forest butchers,' and he aims in the book to awaken a love of the forest in the heart of young America, and a realization that forestry is necessary for the comfort, health and prosperity of future generations."

*Botanical gazette*, Feb. 1917, p.154.

"Well suited to the purpose of interesting the public and more particularly the boys, in the forest and the forester as they concern the happiness and prosperity of our land."

**Morgan, Thomas Hunt.**

A critique of the theory of evolution. 207 p. 1916. Princeton University Press, \$1.50.

*Scientific American*, Feb. 10, 1917, p.162.

"Contains the Vanuxem lectures delivered at Princeton University in 1915-16... Is thoughtful and scholarly without the least manifestation of pedantry."

**Morse, John Lovett, & Talbot, F. B.**

Diseases of nutrition and infant feeding. Macmillan, \$2.50.

*American journal of nursing*, Feb. 1917, p.462.

**Moulton, Forest Ray.**

An introduction to astronomy. New ed. rev. 577 p. 1916. Macmillan, \$2.25.

*American journal of science*, Feb. 1917, p.170.

"Has been entirely rewritten. Unquestionably this book is the most up to date and inspiring presentation of the subject that the writer of this notice has ever seen."

*Scientific American*, Feb. 17, 1917, p.190.

"An excellent aid to the intelligent appreciation of astronomical facts."

**Moxey, Louis W.**

The electrical contractor. Hill, 6s. 3d.

*Electrical review (London)*, Jan. 12, 1917, p.53.

"On this side we are used to the statement that electrical contractors know nothing either of business methods or technical details. It is, however, less easy to explain why American contractors should be so incapable as to make it necessary to write an elementary treatise such as Mr. Moxey has provided for their benefit."

**Nascher, I. L.**

Geriatrics; the diseases of old age and their treatment. Ed.2, rev. Blakiston, \$5.

*St. Paul medical journal*, Feb. 1917, p.64.

"There is much that is interesting in this book, although the reviewer cannot help thinking that all that is really valuable in it could have been set forth in less than half the number of words and that the book would be more widely read and read with greater

**Nascher, I. L.—continued.**

pleasure if it had been less verbose... The pages devoted to arteriosclerosis are worth reading as containing a very complete resumé of our present knowledge of this subject, although... nothing particularly original is set forth."

**Nicholson, J. Lee.**

Cost accounting. 341 p. Ronald Press, \$4.

*Iron age*, Jan. 25, 1917, p.260.

"Does not deal with factory organization or efficiency methods, but purports rather to be a reference book covering the practical parts of cost accounting... Disposes of the 'machine cost' methods in a manner calculated to attract deserving notice."

**Norris, James F.**

Experimental organic chemistry. McGraw, \$1.25.

*Journal of the American Chemical Society*, Feb. 1917, p.331.

"A distinct acquisition to the list of organic manuals and will certainly find a place in many organic laboratories especially where medium courses are offered."

**North American flora. 1916. New York Botanical Garden.**

v.9, pt.6. Agaricaceae, p.375-426.

v.21, pt.1. Chenopodiales: Chenopodiaceae, p.1-93.

*Botanical gazette*, Feb. 1917, p.155.

v.9, pt.6 contains a bibliography for the volume.

**Noyes, Arthur A.**

Qualitative chemical analysis. Ed.6. 130 p. Macmillan, \$1.50.

*Journal of the American Chemical Society*, Jan. 1917, p.176.

"In this edition of Dr. Noyes's excellent manual... modifications of the detailed instructions for some of the procedures are introduced... so as to have qualitative analysis approach quantitative work in accuracy and reliability."

**Noyes, W. A.**

Organic chemistry for the laboratory. Ed.3, rev. & enl. 291 p. 1916. Chemical, \$2.

*Journal of the American Chemical Society*, Jan. 1917, p.175.

"The present edition has taken up as new material a method of synthesis involving the use of malonic ester."

*Journal of the Franklin Institute*, Jan. 1917, p.114.

"An excellent laboratory manual of organic chemistry. The material offered is extensive... The references to the original literature are remarkably complete."

**Nunn, T. Percy.**

Exercises in algebra (including trigonometry). 2v. 1913-14. Longmans, \$1.10; \$1.75.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.176.

**Nunn, T. Percy.**

Teaching of algebra (including trigonometry). 616 p. 1914. Longmans, \$2.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.176.

"There has never before appeared a work so helpful to a teacher of algebra."

**Osborn, Henry Fairfield.**

Men of the old stone age. New ed. 545 p. 1916. Bell, 21s.

*Science progress*, Jan. 1917, p.539.

"Strictly chronological... Deals exclusively with the ancient men of Europe and Java, not with American finds. The greater part of the work is a compilation of well-known facts, such as has often been published before."

**Oswald, John Clyde.**

Benjamin Franklin, printer. 244 p. Doubleday, \$2.

*Printing art*, Feb. 1917, p.477.

"In no work previously printed have the activities of Franklin as applying strictly to printing, publishing, editing, type founding, etc. been solely touched upon. On this account the work will have special appeal to printers."



**Oswald Publishing Co.**

American manual of presswork. New and rev. ed. 1916. Oswald Publishing Co., N. Y., \$4.

*Inland printer*, Jan. 1917, p.533.

"Contains over one hundred line plates, many full-page plates in color, as well as specimen pages in machine photogravure and by offset process."

**Pagé, Victor W.**

Model T Ford car. 228 p. Henley, \$1.

*Engineering news*, Jan. 18, 1917, p.110.

"Author has endeavored to give the non-technical reader an idea of the elementary mechanical principles involved in the various parts of the Ford car."

**Parkhurst, Frederic A.**

Predetermination of true costs and relatively true selling prices. Wiley, \$1.25.

*Engineering news*, Feb. 15, 1917, p.274.

"Cost keeping methods are discussed...with particular attention to their use for determining proper selling prices...Author's general method...is by showing typical printed forms and describing their use and purpose. The forms shown apply especially to foundries and machine shops."

**Pearl, Raymond.**

Modes of research in genetics. 182 p. 1915. Macmillan, 5s. 6d.

*Science progress*, Jan. 1917, p.526.

"May safely be recommended to the layman in search of an objective study of the subject."

**Peirce, Clarence A. & Carver, W. B.**

Handbook of formulas and tables for engineers. Ed.2, rev. & enl. McGraw, \$1.50.

*Sibley journal of engineering*, Feb. 1917, adv. sec. p.8.

"The few errors which appeared in the [first] edition have been corrected and a small amount of new material has been added. The additions consist mainly of the paragraph on the laws of exponents, the formula of hydraulics, tables of natural logarithms and hyperbolic functions, an abbreviated reproduction of the Ellenwood steam charts and a table of steam properties made up from Marks and Davis tables."

**Perkin, F. Mollwo, & Jaggars, E. M.**

Text-book of elementary chemistry. 384 p. 1916. Constable, 3s.

*Chemical news*, Jan. 12, 1917, p.23.

"Contains a satisfactory course of elementary chemistry, although it does not differ essentially from others of the same type."

**Petherbridge, F. R.**

Fungoid and insect pests. 174 p. 1916. Cambridge University Press. (Farm institute series; ed. by T. B. Wood and E. J. Russell.)

*Science*, Feb. 23, 1917, p.191.

"It can hardly serve as a very general reference for farmers and market gardeners as the authors have hoped...As a short reading text or bulletin to familiarize the public with mycological methods and to indicate possible remedial measures for control of a few pests, it contains interesting matter."

**Porter, W. G.**

Diseases of the throat, nose, and ear, for practitioners and students; ed.2, rev. by P. McBride. 280 p. 1916. Wright, 7s. 6d.

*Pharmaceutical journal and pharmacist*, Jan. 27, 1917, p.64.

"Four years have passed since the publication of the first edition of this work, and during that time certain advances have been made, and these have duly been noted by Dr. McBride. The additions include vestibular reactions and the value of the pointing test as a diagnostic in cerebellar abscess."

**Prince, George T.**

Flow of water; tabulated data with explanatory notes relating to flow of water under pressure through clean closed pipes. 149 p. Van Nostrand, \$2.

*Engineering news*, Jan. 18, 1917, p.106.

"The book had its inception in studies by the author on the flow in continuous wood-stave pipe and the tables seem to have been prepared primarily with reference to wood-stave rather than cast iron pipe."

*Engineering record*, Feb. 17, 1917, p.276.

"This book is largely one of tables, showing the results of the author's computations."

*Scientific American*, Jan. 20, 1917, p.90.

Tables, formulas, data and notes relating to the flow of water under pressure through clean closed pipes, from 4-inch up to 120-inch.

**Printing trades blue book, 1917. 542 p. A. F. Lewis, \$3.**

*Printing art*, Feb. 1917, p.477.

"Provides an index to the people engaged in printing and kindred lines arranged on a somewhat different plan from the regular books...It will fill a want. The lists of private printing plants, of paper houses, of firms and individuals engaged in the various callings associated with printing are full and complete and the advertising pages especially well arranged and printed."

**Ramsay, Walter Reeve, and others.**

Care and feeding of infants and children. Lippincott, \$2.

*American journal of nursing*, Feb. 1917, p.461.

"Even the best instructed nurses need reference books of this kind."

**Richardson, O. W.**

Emission of electricity from hot bodies. 304 p. 1916. Longmans, \$2.75.

*Electrical review and western electrician*, Jan. 6, 1917, p.42.

"Written for the scientist rather than the engineer, and the theoretical portions involve the use of the calculus, but the non-mathematical reader will have no trouble with the descriptive parts, which give a good account of the facts of the subject so far as they are at present known."

*Electrical world*, Feb. 10, 1917, p.281.

"Written principally for physicists, and does not give an account of the technical developments of the subject. It is a mine of information, and should be a source of inspiration to electrical engineers."

*Revue générale des sciences pures et appliquées*, Jan. 15, 1917, p.27.

**Ries, Heinrich.**

Economic geology. Ed.[4, rev. & enl.]. 856 p. Wiley.

*Engineering and mining journal*, Feb. 17, 1917, p.321.

"The work is about equally divided, half to non metallics...and half to ore deposits which...include also such minor metals as aluminum, manganese, mercury, antimony and vanadium...Though strictly technical, is very interestingly written and is a valuable addition to the literature of the subject...It is the latest book on the subject and well done."

**Roe, J. W.**

English and American tool builders. 315 p. Oxford, 13s.

*Practical engineer (London)*, Jan. 4, 1917, p.8.

**Rogers, Allen.**

Elements of industrial chemistry. 513 p. Van Nostrand, \$3.

*India rubber world*, Jan. 1, 1917, p.206.

"Abridgment of the author's... 'Manual of industrial chemistry.' While the range of subject is not as broad as that of the larger volume, it is still sufficient to give the student a very comprehensive view of the entire field, and so fills a definite need."

**Rose, Mary Swartz.**

Feeding the family. 449 p. 1916. Macmillan, \$2.10.

*American food journal*, Jan. 1917, p.42.

"After introductory chapters on the nature and digestion of foods, there is a series of chapters giving, seriatim, dietaries for the various members of the family from the oldest to the youngest, not forgetting a special chapter devoted to the needs of the sick and convalescent."

*Science*, Feb. 2, 1917, p.116.

**Roustam-Bek, B.**

Aerial Russia; the romance of the giant aeroplane. 154 p. 1916. Lane, \$1.

*Scientific American*, Jan. 20, 1917, p.90.

"A most illuminating glimpse is given us of the enthusiastic constructors, aviators and workmen; the famous flying men are given a chapter to themselves."

**Rowarth, E.**

Elements of engineering drawing. 131 p. Methuen, 2s. 6d.

*Practical engineer (London)*, Jan. 18, 1917, p.34.

**Rowland, Arthur J.**

Applied electricity for practical men. 375 p. McGraw, \$2.

*American machinist*, Jan. 11, 1917, p.88.

*Electric railway journal*, Jan. 6, 1917, p.62.

"Seems well adapted for practical men who expect to make direct application of their information."

*Electrical record*, Jan. 1917, p.67.

"The author says that this book was written wholly from the standpoint of one who puts up and operates electrical circuits and apparatus."

**Rubber trade directory. 1916. India Rubber World.**

*American industries*, Jan. 1917, p.41.

"Well edited and apparently complete and should therefore be of value to all interested in the rubber trades. Explanatory notes in Spanish, French, Portuguese, German and Italian, and special symbols make the book easily intelligible to users in countries where those languages are used."

**Russell, Alexander.**

Treatise on the theory of alternating currents. Ed.2. v.2. 566 p. Cambridge University Press, 15s.

*Electrician*, Jan. 5, 1917, p.447.

"The book as a whole is essentially one for the mathematical student; there is very little descriptive matter, and although the actual standard of mathematical knowledge required is not high, the point of view in the arguments is generally that which would be taken by a mathematical physicist as compared with that taken by a practical engineer."

**Sadtler, Samuel Schmucker.**

Chemistry of familiar things. 320 p. Lippincott, \$1.75.

*American food journal*, Feb. 1917, p.103.

"Is not a textbook, nor is it a book of reference. It is a book of general interest to the educated man or woman and should find a ready reception among them."

**St. John, Eugene.**

Rotary web presswork. 48 p. Oswald Pub. Co., \$.50.

*Inland printer*, Feb. 1917, p.679.

"A book of valuable information."

**Sales Service Company.**

Selling your services. 176 p. Sales Service Co., \$1.

*American machinist*, Feb. 1, 1917, p.220.

"Takes up a subject which is vital to all technical men, in a manner that at once appears thoroughly comprehensive and logical."

*Metallurgical and chemical engineering*, Feb. 15, 1917, p.233.

"Written in a convincing manner...entirely from the salesman's viewpoint on accepted business principles."



**Salkowski, Erich.**

Wilhelm Schells allgemeine theorie der kurven doppelter krümmung. Ed.3. 196 p. 1916. Teubner, Leipzig, 8 m.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.190.

"A student reading one of the advanced treatises on differential geometry will do well to consult this little book, because of its method of attack and its richness in material."

**Savage, G. C.**

Nervo-muscular mechanism of the eyes and routine in eye work. Author, Nashville, Tenn., \$1.

*Pennsylvania medical journal*, Jan. 1917, p.303.

"This little book of seventy pages gives a clear and easy introduction to the study of the ocular muscles from the viewpoint of the muscles themselves and from the viewpoint of the brain centers controlling them in their individual and associated actions."

**Schäfer, Edward A.**

The endocrine organs. 156 p. 1916. Longmans, 10s. 6d.

*Science*, Feb. 16, 1917, p.167.

"Author has endeavored to compress into this book a great number of observations concerning the organs of internal secretion."

**Schwarzkopf, Ernst.**

Plain and ornamental forging. 277 p. 1916. Wiley, \$1.50.

*Scientific American*, Jan. 20, 1917, p.90.

"Designed for the self-instruction of the beginner in plain and art forging, this text embodies thorough experience and competent instruction."

**Scovell, Clinton H.**

Cost accounting and burden application. 328 p. Appleton, \$2.

*Engineering news*, Jan. 18, 1917, p.108.

"The principles and elements of cost are treated by Mr. Scovell rather than any specific system of cost keeping."

*Iron age*, Jan. 18, 1917, p.207.

"The exposition is so detailed and yet so lucid that students of the elements of cost proportioning as well as managers desiring to improve an existing system will find the work of practical value."

**Shelford, Robert W. C.**

A naturalist in Borneo. T. F. Unwin, 15s.

*Journal of the Royal Society of Arts*, Jan. 19, 1917, p.174.

"A work of original and remarkable interest."

**Sherman, P. Tecumseh.**

Personal injury by accident arising out of and in the course of employment. 67 p. 1916. Workmen's Compensation Publicity Bureau, N. Y., \$2.

*American industries*, Jan. 1917, p.41.

"It is the author's wish to draw attention to the compensation laws of both France and Germany, which, though they may differ in their other provisions, being based alike upon the doctrine of 'trade risk,' are alike as to the class of injuries they are intended to cover, though their terms of definition may differ."

**Simon, W. & Base, Daniel.**

Manual of chemistry. Ed.II. 648 p. Lea, \$3.50.

*American journal of pharmacy*, Feb. 1917, p.88.

"The division dealing with the metals and their compounds is particularly valuable, and includes besides the descriptive chemistry, a very serviceable compilation of tests... Is a worthy successor to the editions which have preceded it, and which have found their way to the book shelves of many medical and pharmaceutical students."

Primarily a text-book for medical and pharmaceutical students.

**Slocum, S. E.**

Elements of hydraulics. Ed.2. 329 p. McGraw, \$2.50.

*Engineering record*, Feb. 10, 1917, p.234.

"Has revised his text and added much of value."

**Smith, Amy Armour.**

The operating room. 295 p. 1916. Saunders, \$1.50.

*American journal of nursing*, Feb. 1917, p.463.

"Notwithstanding its faults, it is an excellent book for all nurses."

**Society for the Promotion of Engineering Education.**

Syllabus of mathematics. 136 p. 1912. The Society, Ithaca, N. Y.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.180.

"Such syllabi will be of great value to students or teachers who wish to review the essentials of elementary mathematics courses."

**Soddy, Frederick.**

Chimie des éléments radioactifs. 174 p. Gauthier-Villars, Paris, 5 fr.

*Electrical world*, Feb. 24, 1917, p.379.

"A good translation...of a very interesting text-book on the chemistry of radioactive materials."

**Spear, Irving J.**

Manual of nervous diseases. 660 p. 1916. Saunders, \$2.75 net.

*Pennsylvania medical journal*, Feb. 1917, p.380.

"Dr. Spear has well performed the task he set out for himself in his endeavor to provide for the student and practitioner, in a book of moderate size, the facts necessary for a proper understanding of the anatomy, physiology and diseases of the nervous system. The work should prove useful in the hands of those for whom it is intended."

**Spencer, Guilford L.**

Handbook for cane-sugar manufacturers and their chemists. Ed.5. Wiley, 15s.

*Journal of the Royal Society of Arts*, Jan. 5, 1917, p.147.

"In order to bring this edition up to date the book has been, to a great extent, re-written, and the chemical section has been revised to meet the conditions of the very large factories now in operation."

**Spencer, Leonard J.**

The world's minerals. 327 p. Stokes, \$2.75.

*Canadian mining journal*, Feb. 1, 1917, p.62.

"For the most part devoted to the description of 116 species of the more common minerals...Colored illustrations of 163 specimens are given."

*Mining American*, Feb. 17, 1917, p.7.

"Text is descriptive, in the main, of 116 species of the more common minerals, illustrated by 163 pictures. All the descriptive matter has been prepared in simple and popular form, so that the book will prove welcome to the reader."

**Sprague, Ernest H.**

Elementary mathematics for engineers. 244 p. Scott Greenwood, \$1.

*Canadian engineer*, Feb. 22, 1917, p.177.

"To the practical engineer whose technical training has been meagre and also to the engineer whose work necessitates reference to calculus, etc., this book will prove most helpful."

*Practical engineer (London)*, Jan. 4, 1917, p.8.

"Mr. Sprague's exposition of arithmetical operations, algebra, trigonometry, geometry and mensuration is well calculated to strengthen knowledge gained at school and lead on to deeper study."

**Stager, Henry Walter.**

A Sylow factor table of the first twelve thousand numbers. 119 p. 1916. Carnegie Institution of Washington.

*Science*, Feb. 2, 1917, p.115.

"Author is to be congratulated upon the completion of so important and formidable a piece of work."

**Stelwagon, Henry W.**

Treatise on diseases of the skin. Ed.8, rev. 1,309 p. 1916. Saunders, \$6.50 net.

*Pennsylvania medical journal*, Feb. 1917, p.380.

"Thorough and complete as have been the earlier editions of this work, the present has been improved in various directions. New articles have been added...while a number of other articles have been more or less radically modified."

**Stiles, Percy Goldthwait.**

Human physiology; a textbook for high schools and colleges. 405 p. 1916. Saunders, \$1.50.

*Journal of home economics*, Jan. 1917, p.42.

"A most welcome addition to that very short list of text-books in physiology which cover the subject more completely and thoroughly than does the high school text, yet not in the detail required for one suitable for use in a medical school."

*Scientific American*, Feb. 3, 1917, p.144.

**Stiles, Percy Goldthwait.**

Nutritional physiology. Ed.2. 288 p. 1915. Saunders, \$1.25.

*Journal of home economics*, Jan. 1917, p.42.

"As a text-book, it is particularly recommended to the attention of teachers of home economics classes...It is also recommended as a book of reference to those interested in reading a brief, sane digest of those topics so difficult to treat, classed under the heading 'Hygiene of Nutrition.' The additions which have been made, though not extensive, are important."

**Still, Alfred.**

Principles of electrical design; d. c. and a. c. generators. 366 p. McGraw, \$3.

*Electrical world*, Feb. 24, 1917, p.380.

"A practical reference text for the practical electrical engineer and designer who desires an aid in the interpretation of the problems which he meets in his work."

*Electrician*, Jan. 12, 1917, p.473.

"Can be confidently recommended to those whose wish it is to be properly grounded before attempting to read larger and more ambitious works."

**Stillman, Thomas B.**

Engineering chemistry. Ed.5. 743 p. 1916. Chemical, \$5.

*American journal of science*, Feb. 1917, p.166.

"Deals with only a restricted field of analytical chemistry, confining itself practically to such materials as are used in civil or municipal engineering...Presents much that is useful in this field, and...is to be highly recommended."

*Engineering news*, Feb. 15, 1917, p.278.

**Taylor, Frederick W. & Thompson, S. E.**

Treatise on concrete, plain and reinforced. Ed.3. Wiley, \$5.

*Engineering news*, Feb. 15, 1917, p.278.

"Brings the discussion...down to the end of 1916. According to the preface, the entire volume has been revised and largely rewritten...It combines better than any other American book a discussion of material, design and construction."

**Taylor, Jay L. B.**

Handbook for rangers and woodsmen. 420 p. Wiley, \$2.50.

*American forestry*, Feb. 1917, p.115.

"Author is a forest ranger in the U. S. forest service, and realized the need of a volume...as a guide for inexperienced men in woods work. It is so complete in detailed description and in illustration that it is most valuable. While primarily intended for the problems confronting the forest ranger, it is of use to others, whose work or recreation takes them into rough and unsettled regions."



**Thompson, A. Beeby.**

Oil field development and petroleum mining. 648 p. 1916. Crosby Lockwood, 25s. net.

*Colliery guardian*, Jan. 19, 1917, p.127.

"'Practical guide to the exploration of petroleum lands, and a study of engineering problems connected with the winning of petroleum including notes on petroleum legislation and customs'... The present volume has... been called for by the rapid exhaustion of the former work [Petroleum Mining]."

*Engineering*, Jan. 5, 1917, p.14.

**Thorne, William V. S.**

Hospital accounting and statistics. Ed.3. About 100 p. Dutton, \$1.25.

*Journal of accountancy*, Jan. 1917, p.80.

"Is the outcome of conferences in 1906 and 1908 between superintendents, treasurers and accountants of some of the larger hospitals of the country. It has been quite widely adopted as a standard by many hospitals and medical associations."

**Thorp, Frank Hall.**

Outlines of industrial chemistry. 665 p. Macmillan, \$3.25.

*Engineering and mining journal*, Feb. 17, 1917, p.321.

"Another revision of this standard book. No attempt has been made to render it a treatise for specialists. It still remains merely a general text book for the student and a guide for the engineer who needs only a superficial knowledge of certain processes... The book should continue to hold the enviable position the previous editions have enjoyed."

**Timbie, W. H. & Higbie, H. H.**

Alternating-current electricity and its applications to industry. 729 p. Wiley, \$3.

*Electrical review and western electrician*, Jan. 6, 1917, p.42.

"This volume, which treats of the operating characteristics of alternating-current apparatus, is a continuation of 'Alternating-current Electricity, First Course,' by the same authors, and, like the first course, is intended, primarily, for trade-school and other students with a limited knowledge of mathematics."

**Toch, Maximilian.**

Chemistry and technology of paints. Ed.2, rev. 366 p. Van Nostrand, \$4.

*Engineering news*, Jan. 18, 1917, p.109.

"The same general arrangement of the book is followed as in the first edition, but so much new material has been added that the new volume will be found useful even by those who are familiar with the other."

**Tottingham, William Edward, & Ince, J. W.**

Chemistry of the farm and home. 424 p. 1916. Webb Pub.

*Journal of the American Chemical Society*, Jan. 1917, p.176.

"Written primarily for use in secondary schools of agriculture... Includes too much general agriculture for a book bearing the name of Chemistry. As a whole the book commends itself to those desiring a text of this character for secondary schools."

**Townsend, E. J.**

Functions of a complex variable. 384 p. 1915. Holt, \$4.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.184.

"On the whole the book is well coordinated with our undergraduate courses and covers just about the ground in function theory which the first year graduate student of mathematics should get well in hand."

**Tuckey, C. O. & Nayler, W. A.**

Statics. 299 p. 1916. Clarendon Press, 3s. 6d.

*Nature*, Jan. 4, 1917, p.347.

"The young teacher will welcome chapter on 'The connections between the principles'... The manner in which couples are introduced is worthy of notice, as is also the chapter on geometrical methods... The book will be a great disappointment to those who share with Sir Peter Teazle a horror of principles."

**United Gas Improvement Co.**

Gas works book. 131 p.

*American gas engineering journal*, Feb. 10, 1917, p.161.

**Upton, G. B.**

Structure and properties of the more common materials of construction. 237 p. 1916. Wiley, \$1.50.

*Revue générale des sciences pures et appliquées*, Jan. 15, 1917, p.27.

**Usherwood, T. S. & Trimble, C. J. A.**

Practical mathematics for technical students. pt.2. 565 p. Macmillan.

*Electrician*, Jan. 5, 1917, p.447.

"A feature of the book is the attention given to vectors."

**Waddell, J. A. L.**

Bridge engineering. 2v. Wiley, \$10.

*Electric railway journal*, Feb. 10, 1917, p.278.

"Dr. Waddell has put into this great work the cream of a lifetime of study and application in this special field. The treatment is...most exhaustive."

*Science*, Jan. 19, 1917, p.66.

"It will be found a very valuable work for the consulting engineer and the bridge specialist, while the engineering student will find an opportunity therein to pursue lines of inquiry upon which he may be engaged, and to learn the opinions of an eminent bridge engineer."

**Walters, Francis M.**

Principles of health control. 476 p. Heath, \$1.60.

*American food journal*, Feb. 1917, p.103.

"The subjects of adjustments in food, avoidance of harmful substances, the use of substances that improve the digestive organs and the details of metabolism and elimination are all well handled."

**Washington, (D. C.) Academy of Sciences.**

Lectures on nutrition. 1916. The Academy.

*Science*, Jan. 5, 1917, p.21.

"Reprint, in collected form, of a series of four published lectures given under the auspices of the Washington Academy of Sciences during April, 1916...Brings together a great deal of useful information and constitutes a handy reference book for investigators and students in nutrition."

**Webster, A. D.**

Tree wounds and diseases. 215 p. Lippincott, \$2.50.

*American forestry*, Feb. 1917, p.115.

"Here is a book which will fill a public need. Everybody loves trees, many own them. When a tree is sick, diseased or injured the owner rarely knows what to do for it. This book clearly and simply tells what to do and how to do it. The illustrations add considerably to the practical instruction given."

**Weed, Walter Harvey, ed.**

Mines handbook and copper handbook. 1916. Stevens Copper Hdbk., \$10.

*Canadian mining journal*, Jan. 1, 1917, p.14.

"Mine descriptions proper have been more conveniently arranged than heretofore. The vast amount of new data contained in the Handbook makes the work valuable to the mining world."

**Weinschenk, E.**

Fundamental principles of petrology; tr. from the German by A. Johannsen. 214 p. 1916. McGraw, \$2.50.

*American journal of science*, Feb. 1917, p.173.

"In several ways is an improvement on the original work...May be usefully read by teachers and students who are not acquainted with it in the original text."

**Weinschenk, E.—continued.**

*Canadian mining journal*, Feb. 1, 1917, p.62.

"Recognized as one of the most useful for those beginning the study of petrology. The translator has rendered a distinct service by making the work accessible to a large number of English speaking people."

*Engineering and mining journal*, Feb. 17, 1917, p.321.

"The American literature of petrography is distinctly enriched by this work... Covers petrology in its widest sense, hence sediments and metamorphic rocks as well as weathering, thermal alteration and contact metamorphism are given proper consideration... Work is scarcely suitable for a general text-book, but no advanced student can fail to derive an immense amount of benefit from the perusal."

**Wellman, Mabel Thacher.**

Food study. 314 p. Little, \$1.

*American food journal*, Feb. 1917, p.103.

"An excellent combination laboratory manual and textbook on domestic science."

**Wentworth, G. & Smith, D. E.**

Plane and spherical trigonometry and tables. 230+104 p. 1914. Ginn.

*Bulletin of the American Mathematical Society*, Jan. 1917, p.189.

"As a whole the book does not differ noticeably from the many text-books covering the same ground. There are some inaccuracies... Is a work to replace the Wentworth Trigonometry."

**West, G. S.**

Algae. v.I. 476 p. 1916. Cambridge University Press, 25s.

*Pharmaceutical journal and pharmacist*, Jan. 27, 1917, p.63.

"Present volume, which is twice the size of the previous work, consists only of a biological account of the algae, the descriptions of the species and systematic arrangement being left to a second volume, which is to be published later, and will include all the freshwater algae except the diatoms and desmids, although the morphology and life history of these two large families are given in the present volume."

**Westcott, H. P.**

[Handbook of casinghead gas.] Metric Metal Works, Erie, Pa.

*Petroleum review*, Jan. 27, 1917, p.77.

"After explaining the methods of purchase for casinghead gas and also the methods of settlement for same, the book takes up the methods of manufacture; in other words, the process by which the motor spirit is obtained."

**White, George F.**

Laboratory and class-room guide to qualitative chemical analysis. 171 p. Van Nostrand, \$1.25.

*Journal of the American Chemical Society*, Feb. 1917, p.330.

"Would have to be handled with great care in the teaching. There is so much general chemistry in it that students might lose the main issue and fail to learn how to make qualitative analyses. However there is a difference of opinion on this point."

**White, Lazarus, & Prentis, E. A.**

Modern underpinning; development, methods and typical examples. 94 p. Wiley, \$1.50.

*Engineering record*, Feb. 17, 1917, p.276.

"The authors of this book desired to give the engineering profession, by brief descriptions of general methods and specific cases, and by a series of unusually clear illustrations, an accurate record of some of the best solutions of underpinning problems worked out in New York City."

**Wilcox, E. A.**

Electric heating. 292 p. Technical Pub. Co.

*Electrical record*, Feb. 1917, p.78.

"Aims to set forth in a practical way the many uses to which electrical heat may be put."



**Wilcox, Earley Vernon.**

Tropical agriculture. 373 p. Appleton, \$2.50.

*India rubber world*, Jan. 1, 1917, p.206.

"Deals with agriculture in the commercial sense, and describes the nature, source and production of about 350 tropical commodities to eat, wear, and use in technical industries."

**Winslow, Kenelm.**

Prevention of disease. 348 p. Saunders, \$1.75.

*Mind and body*, Feb. 1917, p.480.

"Practical guide for the layman, giving him briefly the means to avoid the various diseases described."

*Scientific American*, Feb. 10, 1917, p.162.

"Detailed, practical guide to the avoidance of common diseases."

**Wood, S. T.**

Rambles of a Canadian naturalist. 247 p. 1916. Dent, 6s.

*Science progress*, Jan. 1917, p.527.

"Short essays on many things—the birds, the beasts, the insects, flowers, and trees—that are to be met by the naturalist rambling in Eastern Canada and arranged in the order of the seasons."

**Woodman, A. G.**

Food analysis. 510 p. McGraw, \$3.

*American food journal*, Jan. 1917, p.43.

"Decidedly well worth while if considered in the light of a treatise on methods rather than a reference work."

**Young, George Joseph.**

Elements of mining. 628 p. McGraw, \$5.

*Engineering news*, Feb. 15, 1917, p.276.

"The author states that his aim has been to give...a comprehensive view of mining. As a text book for students...will probably be favorably received and widely used."

*Mining American*, Feb. 17, 1917, p.7.

"Purpose is...to give...a comprehensive view of mining problems and their treatment...We do not know of another book which answers so satisfactorily the demand for instruction of the kind given by Mr. Young...The whole subject matter of mining has been brought within the covers of one book...good for any student of mining matters."

*Mining magazine*, Jan. 1917, p.56.

"Contains a mass of interesting and valuable information in very readable form; it is essentially modern in text, illustration, and treatment, and can be highly recommended both to students in training and engineers in practice."



REPUBLICAN PARTY OFFICE

NO. 1

1884

1884

REPUBLICAN PARTY OFFICE

abstracted from  
Carnegie  
Library  
Public  
Library





45

P  
B6  
1

TECHNICAL BOOK REVIEW INDEX

VOL. 1

NO. 2

( apr 1917 )

MEMORANDUM FOR THE RECORD

1. [Illegible]

2. [Illegible]

3. [Illegible]



[Illegible text at the bottom left of the page]



## Technical Book Review Index

This index, printed from part of a card-index maintained by the Carnegie Library of Pittsburgh, is a record of certain book reviews appearing in the scientific, technical and trade journals currently received in the Technology Department. It is concerned mainly with books on pure and applied science, but includes a few on allied subjects. Its purpose is primarily to *index* reviews rather than to compete with any existing booklist by suggesting books on any subject, or by furnishing bibliographic information. In accordance with this plan, the arrangement is by authors, though the form of entry, being determined from the review and not from the book itself, is in some cases doubtless incorrect.

Except for the correction of obvious errors, the bibliographic information is as given in the review, or as combined from two or more reviews when several are indexed. Since many of the reviews are carelessly done, the information given is, in many cases, both inaccurate and incomplete. In general the names of publishers are abbreviated in accordance with the practice in the more important book-trade bibliographies. Titles of journals are as a rule given in full.

Each quotation immediately follows the name of the journal from which it is taken. Obviously these brief extracts when thus detached from the context, must not be accepted as conclusive. Very often a review is so equivocal that there can be no unanimity of opinion as to whether it is favorable or unfavorable. For this reason no estimate is given here. Except for this one omission, this index is an exact copy of cards filed in the book review index of the Carnegie Library of Pittsburgh.

The "Technical Book Review Index," published in April and July, 1915 by the Index Office, Inc., Chicago, consisted of a record of technical book reviews furnished by the Carnegie Library of Pittsburgh.

The Technical Book Review Index to be published by this Library begins with the year 1917, the first instalment having appeared in the Monthly Bulletin for March. For the present it will be continued monthly.

### Aldrich, J. M.

Sarcophaga and allies in North America. 1916. Entomological Soc. of Am., Lafayette, Ind.

*Science*, March 9, 1917, p.240. 1¾ col.

"Treatment throughout is full and sufficient; the genera and species are separated by keys, and the descriptions of the species are quite detailed. Types are carefully designated, and localities and collectors are cited."

**American Gas Institute**—Sub-committee on chemical tests.

Gas chemists' hand-book. 354 p. 1917. The Institute, \$3.50.

*Gas age*, March 15, 1917, p.276.  $\frac{1}{2}$  col.

"The whole purpose of the book is to present in one volume for the convenience of the gas chemists standard methods of testing and sampling according to the best known practices at this time."

**[American School of Correspondence.]**

Modern shop practice. Ed.6, rev. & enl. 6v. Am. Technical Soc., \$17.80.

*Iron age*, March 8, 1917, p.606.  $\frac{1}{3}$  col.

"Comprehensive cyclopedia of shop tools and methods. Innumerable topics are touched, many of them very tersely, much dependence being had on the many illustrations."

**Andrews, E. C.**

Color and its distribution in printing; how to estimate ink. Inland Ptr., \$10.

*Printing art*, March 1917, p.65.  $\frac{1}{2}$  col.

"Intended to supplement... 'Color and Its Application to Printing.' It makes clear... the various facts regarding the covering qualities of inks by the presentation of many fine examples run on different papers and in a number of colors... As a scientific presentation of the different color problems regularly met with, and as a help in overcoming all these problems, the book is in a class by itself."

**Archbold, Maurice J.**

Laboratory course of practical electricity. 222 p. 1916. Macmillan, \$1.10.

*American journal of science*, March 1917, p.249.  $\frac{1}{3}$  p.

"This manual may be used in connection with any text-book and the experimental work suggested is supposed to be supplemented by lectures and demonstrations... Wiring diagrams for all the experiments are given in the appendix."

*Journal of the American Society of Mechanical Engineers*, March 1917, p.273.  $\frac{1}{4}$  col.

"Made up of about one hundred loose-leaf blanks... and is designed to be used in connection with any textbook."

**Austin, F. E.**

Examples in alternating currents. Ed.2. v.1. 223 p. 1916. Author, Hanover, N. H., \$2.40.

*Engineering-education*, Feb. 1917, p.345. 3 l.

"Unique development of the fundamental principles of alternating currents by the use of well-chosen illustrating problems. Desirable for use as a student text or reference work."

**Aydelotte, Frank, comp.**

English and engineering. 390 p. McGraw, \$1.50.

*American machinist*, March 8, 1917, p.440.  $1\frac{1}{2}$  col.

"Collection of selected essays, some by famous authors and some by others of lesser note... A most interesting collection of good writings that any man will profit by reading, and it should find a welcome on the shelf of every technical man who aspires, as he should, to evaluate the place that his profession occupies in the affairs of the world."  
*Dexter S. Kimball.*

**Barbier, Henri, & Paris, Jean.**

Chimie photographique. 325 p. 1916. Doin, Paris, 6 fr. (Encyclopédie scientifique.)

*Revue générale des sciences pures et appliquées*, Jan. 30, 1917, p.58. 1 col.

**Berg, Ernst Julius.**

Electrical engineering; advanced course. 332 p. McGraw, \$3.50.

*Engineering news*, March 15, 1917, p.436.  $\frac{1}{4}$  col.

"Professor Berg has here prepared a book on the more advanced phases of electrical engineering in a way that a student with only the usual mathematical training can grasp."

**Bingham, Charles.**

Manufacture of carbide of calcium. 219 p. 1916. Raggett, 5s. net.

*Colliery guardian*, Feb. 2, 1917, p.238.  $\frac{1}{3}$  col.

"Seems to give all necessary information for intending manufacturers, and it promises to become a standard work on the subject."

**Boutroux, Emile.**

Contingency of the laws of nature; tr. by Fred Rothwell. 196 p. 1916. Open Ct., 5s. net.

*Nature*, Feb. 1, 1917, p.426. 1 col.

"Originally presented as a thesis to the Sorbonne in 1874... Altogether we are inclined to doubt whether the Open Court Publishing Company and Mr. Rothwell have done much service to philosophic thought by bringing forward this early thesis, or whether its republication will add much to the author's very considerable reputation in England."

**Brady, William.**

Personal health; a doctor book for discriminating people. 407 p. 1916. Saunders, \$1.50.

*Scientific American*, Feb. 17, 1917, p.190.  $\frac{1}{4}$  col.

"Essentially sensible and practically helpful... Food, clothing, and common habits and ailments are fairly thoroughly discussed, and drugs play a very minor part."

**Brown, William Alden.**

Portland cement industry. Crosby Lockwood, 7s. 6d.

*Concrete and constructional engineering*, Feb. 1917, p.102. 1 col.

"Although certain parts require revising... there are undoubtedly many hints here which will be of value to the cement user."

**Cady, Hamilton P.**

General chemistry. 522 p. 1916. McGraw, \$1.50.

*American journal of science*, March 1917, p.247.  $\frac{1}{4}$  p.

"It gives a very satisfactory presentation of chemical facts with a suitable amount of theory introduced in such a manner as to explain the facts as they are brought forward. Comparatively little attention is paid to the details of chemical experiments, so that it is to be presumed that the book is expected to be used in connection with another book, a guide to laboratory work." *H. L. W.*

*Journal of the American Chemical Society*, March 1917, p.528. 1 p.

"The teacher will find it accurate, fairly well balanced, teachable; the student should find it clear and interesting." *W. S. Hendrixson.*

**Chemical Rubber Company.**

Handbook of chemistry and physics. Ed.5. 414 p. 1916. The Company, Cleveland, \$2.

*Metallurgical and chemical engineering*, March 15, 1917, p.350.  $\frac{1}{4}$  col.

"A ready reference pocket-book of chemical and physical data... Material is compiled from the most authoritative sources such as Chemiker-Kalender, the Landolt-Börnstein-Meyerhoffer tables, and a large number of text-books and other reference works... Fifth edition is a revision of the previous one under the direction of Charles B. Hodgman and M. F. Coolbaugh of the Case School of Applied Science."

**Child, Charles Manning.**

Senescence and rejuvenescence. 481 p. 1915. Univ. of Chicago Press, 16s.

*Revue générale des sciences pures et appliquées*, Jan. 30, 1917, p.58.  $2\frac{1}{2}$  col.

**Church, A. Hamilton.**

Manufacturing costs and accounts. 452 p. McGraw, \$5.

*American machinist*, March 1, 1917, p.396.  $1\frac{1}{2}$  col.

"This book, as the title indicates, is something more than a treatise on the theory of costs; it aims to explain the fundamental theory of accounting, by which the facts



**Church, A. Hamilton—continued.**

of cost accounting are recorded and interpreted... It is a very praiseworthy production and is a decided addition to the literature of the subject."

*Iron age*, March 8, 1917, p.605. ½ col.

"Object is to present to the student of cost accounting a simple view of the general structure of cost accounts, the why and wherefore, rather than a detailed description of specific systems... The author has prepared his book with great care."

**Clapham, Charles B.**

Arithmetic for engineers, including simple algebra, mensuration, logarithms, graphs and the slide-rule. 436 p. Dutton, \$3.

*Engineering news*, March 15, 1917, p.436. ¼ col.

"Intended to be directly useful, all purely academic operations, such as highest common factor and recurring decimals, being omitted. Numerous examples (with answers) are presented that should interest men in the drafting room, machine shop and laboratory as well as those studying engineering pursuits."

**Clewell, C. E.**

Handbook of machine shop electricity. 461 p. McGraw, \$3.

*Electrical age*, March 1917, p.50. ¼ col.

"For the electrical superintendent, electrician, and maintenance man in an industrial plant, this handbook should be of almost daily use."

**Compton, Wilson.**

Organization of the lumber industry. 153 p. 1916. Am. Lumberman.

*Journal of forestry*, Jan. 1917, p.117. 2½ p.

"No publication comes to mind in which so many significant facts relating to timber and the lumber industry are brought into so small a compass... This book is professedly an economic one strictly." *Austin Cary*.

**Conley, Emma.**

Principles of cooking. Am. Bk., \$52.

*American food journal*, March 1917, p.155. ¼ col.

"In this rather modest textbook no attempt was made to dig very deeply into the food industry."

**Cooke, Joseph Brown.**

The baby; before and after arrival. 239 p. 1916. Lippincott, \$1.

*Journal of home economics*, March 1917, p.144. 1 col.

"In many ways it is an admirable presentation... It is encouraging to find another straightforward, thoroughly scientific popular book on the subject of childbearing." *Dorothy Reed Mendenhall*.

**Couriot, H.**

L'armée du travail de la France; l'apprentissage; la formation des ingénieurs. 44 p. Formation professionnelle, Paris.

*Le Génie civil*, Feb. 10, 1917, p.104. ½ col.

**Cowee, George Alvin.**

Practical safety methods and devices. 428 p. 1916. Van Nostrand, \$3.

*Coal age*, March 17, 1917, p.492. 1 col.

"Meets a real need of the public. It draws together safety devices from all fields."

*Colliery guardian*, Feb. 2, 1917, p.238. 1 col.

"A book of guiding principles, and, as such, we can heartily recommend it."

*Iron and coal trades review*, Feb. 2, 1917, p.129. ½ col.

"An American book by the manager of the Bureau of Safety of the Utica Mutual Compensation Insurance Corporation, U. S. A... Safety engineering, we are... told, though a comparatively new field, has become a well-established profession, and the money spent in accident prevention is unquestionably a paying investment."

**Duff, Loretto Basil.**

Course in household arts. 301 p. 1916. Whitcomb & B., \$1.10.

*Journal of home economics*, March 1917, p.143. ¾ col.

"Handles the subject in an easy and simple style, suitable for students in the elementary grades, and is unusually good in helpful economic suggestions...The canning and preserving of fruits...finds no consideration in this otherwise excellent book." *Euphemia E. Evoy*.

**Ealand, C. A.**

Insect enemies. 223 p. 1916. Richards, 6s. net.

*Nature*, Feb. 1, 1917, p.427. ½ col.

**Farrington, O. C.**

Meteorites; their structure, composition and terrestrial relations.

233 p. 1915. Author, Chicago, 8s. 6d.

*Geological magazine*, Feb. 1917, p.86. 1½ p.

"Fills a gap in scientific literature and will be indispensable to the student who desires a general knowledge of the subject...The best general introduction to the study of meteorites which has yet appeared." *A. S.*

**Fernald, Robert H. & Orrok, G. A.**

Engineering of power plants. 569 p. 1916. McGraw, \$4.

*Journal of the American Society of Mechanical Engineers*, March 1917, p.276. 1¼ col.

"Not a treatise on power plants. It is simply an epitome of the subject arranged by the authors for convenient classroom use.' Is an excellent book: good material well presented; the faults and errors are few." *L. P. Breckenridge*.

**Franklin, William S. & MacNutt, Barry.**

General physics; an elementary treatise on natural philosophy.

604 p. McGraw, \$2.75 net.

*Engineering news*, March 15, 1917, p.435. ¾ col.

"Subtitle of this book is the key to the contents...Is intentionally a somewhat dilute philosophical discussion of those natural phenomena whose study we commonly include under 'physics.'"

**Fuller, Mary E.**

Constructive sewing; book I. 91 p. 1916. Industrial Book and

Equipment Co., \$60.

*Journal of home economics*, March 1917, p.144. ¾ col.

"One of three books in the Sewing Series...Stands out as unique in this field of text book material. It not only presents the subject matter in a simple and logical way, but through the use of good illustrations, questions, and methods suggested, makes itself of particular value." *Anna M. Cooley*.

**Furgerson, A. N. & Johnson, Constance.**

From house to house. 291 p. 1916. Dutton, \$1.50.

*Journal of home economics*, March 1917, p.143. 1 col.

"The purpose of the book as stated by the authors, is to serve the housewife as a 'refuge from the commonplace'...The plan of the book is that of an encyclopaedia, subjects being listed alphabetically so as to suggest a variety of ways of using one food material...Such an arrangement, were it combined with a page index, might be of advantage...The subject-matter of the book lays itself open to adverse criticism in that many of the recipes...have not been carefully enough edited to secure good results in untried hands." *Mildred Weigley*.

**Furman, Franklin De R.**

Elementary cams. 87 p. Wiley, \$1.25.

*Journal of the American Society of Mechanical Engineers*, March 1917, p.273. ¼ col.

"Describes the various types of cams in common use, and then defines the terms employed in the solution of design problems. Following this come explanations of the methods of constructing the several generally used base curves for unit rise of the follower. In the third section, which comprises over half the book, the advantages of designing on a scientific basis instead of by cut-and-try methods are set forth."

**Garrard, Charles C.**

Electric switch and controlling gear. 656 p. Electrician, \$6.

*Electrical review and western electrician*, March 17, 1917, p.463. 1 col.

**Gillette, Halbert Powers.**

Handbook of rock excavation; methods and costs. 830 p. Clark Bk. Co. Inc., 21s. net.

*Mining magazine*, Feb. 1917, p.120. 1 col.

"He writes for the civil engineer and his advice is equally good for the miner. For this reason his book, covering a definite scope, is to be recommended."

**Goddard, Richard E.**

General cargo; an introduction to salesmanship. Constable.

*Engineer*, Feb. 2, 1917, p.113. ½ col.

"We feel certain that no one will read Mr. Goddard's book without deriving benefit from it somewhere, and interest or amusement from it everywhere."

**Gower, H. D. and others.**

The camera as historian; a handbook to photographic record work for those who use a camera and for survey or record societies. 259 p. 1916. Low, 6s. net.

*Nature*, Feb. 8, 1917, p.445. 1 col.

"Although the work is as yet only in its early stages, about fifty thousand photographs have been deposited and catalogued for reference in various public libraries and museums. The authors give as complete details as they have been able to obtain...with the methods adopted in various places for classifying and storing the records...We recommend a study of the volume not only to those who are already interested in record work, but to photographers in general, whether professional or amateur."

**Griffiths, W. St. B.**

Practical experiments in heat and light. 235 p. 1916. Rivingtons, 3s. 6d. net.

*Chemical news*, Feb. 2, 1917, p.59. ½ col.

"This book appears to be a thoroughly useful guide to experimental work in heat and light. It contains descriptions of such experiments as can be performed by young students themselves with the apparatus usually to be found in the average well equipped physical laboratory."

**Grunsky, Carl Ewald.**

Valuation, depreciation and the rate-base. 387 p. Wiley, \$4.

*Engineering news*, March 15, 1917, p.434. 2½ col.

"Notable addition to the small number of books that treat at all fully the subject of valuation and related problems...Is the result of personal contact, long experience and much study of the valuation problem, has been written with much care and contains many valuable ideas."

**Guerin, William.**

How to protect your factory from fire. 77 p. Pyrene Mfg. Co., N. Y. \$1.

*Railway age gazette*, March 9, 1917, p.389. ¼ col.

"A thoroughly practical and complete answer to the question suggested by its title...Its character as an advertisement is modest and inoffensive. The author, for 35 years connected with the fire department of New York City...is now...chairman of the fire prevention committee of the Safety-First Federation of America."

**Guichard, Marcel.**

Conférences de chimie minérale, faites à la Sorbonne; métaux. Ed.2, rev. 1916. Gauthier-Villars, Paris.

*Journal of the American Chemical Society*, March 1917, p.529. 1½ p.

"Both table of contents and index are very complete. In a brief review it is impossible to do justice to this work. We have read it with much interest and profit, and recommend it warmly to teachers and students." *L. W. McCay*.



**Halsey, Frederick A.**

Handbook for machine designers, shop men and draftsmen. Ed.2, rev. & enl. 561 p. 1916. McGraw, \$5.

*Journal of the American Society of Mechanical Engineers*, March 1917, p.275. 1 col.

"Places before the reader a large amount of information which heretofore had been spread over a great number of books, pamphlets, articles, papers, etc., and which for this reason was not available to those for whom this book was mainly written. It makes this information available to the practical man, whereas heretofore it has been available only to the student."

**Hamilton, Douglas T. & Jones, F. D.**

Automatic screw machines. 342 p. 1916. Industrial Press, \$2.50.

*Journal of the American Society of Mechanical Engineers*, March 1917, p.275. 1 col.

**Heller, A. H.**

Stresses in structures; ed.3, rev. by Clyde T. Morris. 374 p. Wiley, 11s. 6d.

*Concrete and constructional engineering*, Feb. 1917, p.102. 1½ col.

"Has for its aim to combine a 'student's text-book with a book of reference for the practical engineer whose time is too much taken up to get, with advantage, from elaborate treatises a working theory for whatever problem he may have on hand'...On the whole the author has succeeded very well in achieving the object which he had in view, and it is to be regretted that Professor Heller died before he completed the book...The style is concise and many references...are given, although we would suggest that the reviser has not revised these references sufficiently."

**Hemenway, Henry B.**

American public health protection. 283 p. Bobbs, \$1.25.

*Mind and body*, March 1917, p.50. ¾ p.

"Here is set forth in compact form the history of the development of care of public health in this country...Then the work of national health agencies, and especially that of the medical department of the Army and the Bureau of Animal Industry, is discussed...The medical inspection of schools, the organization of health departments, the preparation of health officers, are other phases of the subject which are handled in detail and with unflinching interest."

**Herbert, T. E.**

Telegraphy; a detailed exposition of the telegraph system of the British Post Office. Ed.3. 985 p. Whittaker, 9s. net.

*Electrician*, Feb. 9, 1917, p.580. 1 col.

"Object...is to supply the need for an up-to-date and detailed exposition of the telegraph practice of the British Post Office, and also to provide the requirements of the Post Office Department and the City and Guilds' examinations on the subject. Both of these aims are very completely met...To the aspiring telegraphist and the younger student the book leaves nothing to be desired. The text is clearly written, the diagrams are well drawn and lavishly supplied."

**Holleman, A. F.**

Text-book of inorganic chemistry; issued in English in cooperation with Hermon Charles Cooper. 5th Eng. ed. 521 p. 1916. Wiley, \$2.25 net.

*Journal of the American Chemical Society*, March 1917, p.529. ¾ p.

"As a text for the basal work in chemistry in American institutions the book presents too much and is too detailed. It fails to emphasize essentials as compared with non-essential features...On the other hand, those who intend to become professional chemists will find the volume a profitable one to peruse after they have had the usual basal preliminary courses in classroom and laboratory." *Louis Kahlenberg*.

**Holms, A. Campbell.**

Practical shipbuilding. Ed.3. 2v. Longmans, 52s. 6d. net.

v.1. Text.

v.2. Diagrams and illustrations.

*Engineering*, Feb. 2, 1917, p.95. 3 col.

"As a thoroughly sound and up-to-date treatise on the practical work undertaken in

**Holms, A. Campbell—continued.**

a modern shipyard, from preparing the building berth to the completion of the fitting out of all types of merchant vessels, also their subsequent upkeep in the matter of docking, repairs, &c., the new edition of 'Practical Shipbuilding' is in the front rank."

**Holt, Andrew H.**

Manual of field astronomy. 128 p. Wiley, \$1.25.

*Engineering news*, March 15, 1917, p.436. ¼ col.

"Purpose of this new work... is to furnish a text sufficiently concise to fit into a college course in surveying and yet give enough of the fundamentals to enable its use in general practice... There is every evidence that his little book does fill the bill. It is clearly and concisely written and much more complete than the usual college-student manual."

**Hough, B. Olney, comp.**

Export trade directory, 1917-18. Ed.5. 536 p. Johnston Export Pub. Co., \$5.

*Engineering news*, March 15, 1917, p.438. ½ col.

*Iron age*, March 8, 1917, p.605. ½ col.

"Fifth edition of this reference book of the export trade keeps pace with the increase in the foreign business of the United States. The book has been revised and enlarged 50 per cent and now includes over 2000 firms."

**Hudson, Hilda P.**

Ruler and compasses. 143 p. 1916. Longmans.

*Engineering-education*, Feb. 1917, p.345. ½ p.

"Valuable little book for teachers and students of geometry and the applications of geometrical instruments."

**Hurley, Edward N.**

The awakening of business. 240 p. 1916. Doubleday.

*American industries*, March 1917, p.42. 1 col.

"Is in two parts, 'How business men can help themselves,' and 'Government and business,' with three appendices, Federal Trade Commission Act, Clayton Act (in part), and a letter of F. W. Lehmann to George K. Smith."

**Hutchison, Robert.**

Food and the principles of dietetics. Ed.4. 617 p. 1916. Arnold, 16s. net.

*Pharmaceutical journal and pharmacist*, Feb. 3, 1917, p.94. ¼ col.

**International Institute of Agriculture, Rome.**

International movement of fertilisers and chemical products useful to agriculture. 76 p. 1916. International Institute of Agriculture, Rome, 1 fr. 50.

*Chemical news*, Feb. 2, 1917, p.59. ¼ col.

"This reprint... appears very opportunely... It gives full and detailed information relating to the production, trade, consumption and prices of all important chemical fertilisers and also sulphur and copper sulphate. Most of the trade statistics are official, and every effort has been made to make the data relating to the consumption in various countries as full and accurate as possible."

**Jansky, Cyril M. & Faber, D. C.**

Principles of the telephone. pt.1: Subscriber's apparatus. 160 p. 1916. McGraw, \$1.50. (Industrial education series.)

*Engineering news*, March 15, 1917, p.436. ½ col.

"Conforms both in readableness and technical content to the high standards set by previous volumes... Covers local-battery, common-battery and intercommunicating systems, and both Bell (Western Electric Co.) and independent equipment."

**Jeter, S. F.**

Riveted boiler joints. 155 p. McGraw, \$3.

*Power*, March 6, 1917, p.334. ¼ col.

"If we see its purposes and possibilities aright, here is a book that will become as standard upon the drawing board of the designer of boilers as are the traverse tables upon the desk of the surveyor."

**Johnson, R. H. & Huntley, L. G.**

Principles of oil and gas production. 390 p. Wiley, 16s.

*Mining magazine*, Feb. 1917, p.120. 1½ col.

"Throughout we find most valuable hints drawn from practical experience...while the index, exceeding ten pages, furnishes an adequate guide to the whole, except that it apparently omits the last chapter...and the Appendix." *W. H. Dalton*.

**Jones, Ernest, & Griffith, J. J.**

Chemistry for rural schools. 184 p. 1916. Blackie, 2s. 6d. net.

*Chemical news*, Feb. 2, 1917, p.59. ½ col.

"Intended to be used as a theoretical and practical introduction to agricultural chemistry for students in technical schools and agricultural colleges, and at the same time the authors believe that it may be found useful for general students who are beginning chemistry, but do not mean to specialise in scientific agriculture...The wide adoption of the book in rural schools would be a decided step forward."

**Jones, F. Wood.**

Arboreal man. 230 p. 1916. Arnold, 8s. 6d. net.

*Nature*, Feb. 1, 1917, p.426. 1 col.

"The outstanding merit of the book...is that it impresses upon the mind of the student the importance of studying *living* animals and human beings as the indispensable method for really understanding the meaning of their anatomy...His main theme is the examination of the far-reaching and determining influence of arboreal habits in the evolution of man's structure, distinctive abilities and outlook."

**Jouguet, E.**

Mécanique des explosifs. v.1: Étude de dynamique chimique. 520 p. 1917. Doin, Paris, 6 fr.

*Revue générale des sciences pures et appliquées*, Jan. 30, 1917, p.57. 2 col.

**Judge, Arthur W.**

High-speed internal combustion engines. Whittaker, 15s.

*Model engineer and electrician*, Feb. 22, 1917, p.124. ½ col.

"Essentially a book for the designer and investigator, rather than for the builder or charge-engineer...Mr. Judge has made a very useful contribution to the literature of the subject in this well considered and carefully presented survey of the theory underlying successful design."

**Karapetoff, V.**

Engineering applications of higher mathematics. 5v. Wiley, 3s. each.

*Engineering*, Feb. 2, 1917, p.96. 1½ col.

"The division into small separate treatises is happy...The author neither belittles nor exaggerates the potency of mathematical reasoning. He knows its usefulness in providing a clear and logical conception of complicated conditions and also its limitations in practice."

**Kober, George M. & Hanson, W. C. ed.**

Diseases of occupation and vocational hygiene. 918 p. 1916. Blakiston, \$8.

*American industries*, March 1917, p.43. 1 col.

"A collection of monographs by the various specialists...Part I deals with the Specific and Systematic Diseases of Occupation...Part II deals with the Causation and Prevention of Occupational Diseases and Accidents...Part III is intended to be of



**Kober, George M. & Hanson, W. C. ed.—continued.**

service to those who may be called upon to investigate in the shop, the factory, in the dispensary and hospital the relations of occupation to disability and disease."

*Science*, March 16, 1917, p.260. 2 col.

"Many of the topics are so treated as to make noteworthy contributions to the science of industrial hygiene."

**Lamond, H.**

Sea-trout; a study in natural history. 219 p. 1916. Sherratt & H., 21s. net.

*Nature*, Feb. 8, 1917, p.445. 1 col.

"Life-history and habits of the sea-trout of Loch Lomond and the Clyde estuary... A work of considerable interest and real value."

**Lavis, F.**

Instructions to locating engineers. 44 p. McGraw, \$1.

*Railway age gazette*, March 9, 1917, p.389. ¼ col.

"Instructions prepared by the author for use of field parties working under his direction in the United States, South America and China...Valuable to anyone responsible for railway location, either in the preparation of a set of instructions or in the revision of a set of rules already in use."

**Lawrence, Ralph R.**

Principles of alternating current machinery. 614 p. McGraw, \$4.50.

*Electrical review and western electrician*, March 17, 1917, p.463. ¾ col.

"Will undoubtedly prove very popular...The second volume of a series of electrical engineering texts prepared under the supervision of a committee of prominent engineers and teachers of electrical engineering...This second volume is a treatise on the fundamental principles of construction and operation of alternating-current machinery." *C. M. Jansky*.

**Leake, P. D.**

Depreciation and wasting assets and their treatment in computing annual profit and loss. Ed.2, rev. & enl. Pitman, 10s. 6d. net.

*Iron and coal trades review*, Feb. 16, 1917, p.185. ¾ col.

"This is the second edition of a book which—we are told—has been thoroughly revised, and enlarged by three chapters dealing respectively with the 'then value' of a plant, with the financial proposals in the London County Council's report on the electricity supply of the Metropolis, and with depreciation and controlled establishments under the Munitions of War Act of 1915."

**Légros, Lucien Alphonse, & Grant, J. C.**

Typographical printing surfaces. 732 p. Longmans, \$12.50.

*Inland printer*, March 1917, p.815. 2 col.

"Comprehensive to a degree heretofore unmatched as a treatise on the technology and mechanism of the production of typographical printing-surfaces."

*Printing art*, March 1917, p.65. ½ col.

"The title of this work hardly defines its character...A remarkable storehouse of information. An infinite amount of study and research was undoubtedly required to bring together so many facts...It gives facts and figures, as well as many technical details that can be secured through no other single source."

**Lewis, E. R.**

Winter track work. 157 p. Railway Educational Press, \$1.60.

*Railway and locomotive engineering*, March 1917, p.107. ½ col.

"A notable addition to track work literature."

**Lockwood's** builders', architects', contractors' and engineers' price book. 1917. Crosby Lockwood, 4s. net.

*Engineer*, Feb. 16, 1917, p.159. ¼ col.

"Present edition has evidently been prepared with the studied care which has characterised previous editions."

**Loeb, Jacques.**

The organism as a whole from a physicochemical viewpoint. 1916.  
Putnam, \$2.50.

*Journal of the American Chemical Society*, March 1917, p.523. 4½ p.

**Luckiesh, M.**

Light and shade and their applications. 290 p. Van Nostrand, \$2.50.

*Printing art*, March 1917, p.65. ⅓ col.

"As a companion to... 'Color and Its Applications' the present book will be found of additional interest, while viewed independently it may also be regarded as containing matters relating to the art and science of lighting that will prove new to many... Will be helpful to art students, to engravers, to photographers, and to those working in the many branches of the graphic arts."

**McCurdy, J. H.**

Calisthenic nomenclature. 63 p. Author, Springfield, Mass., \$1.25.

*Mind and body*, March 1917, p.50. 5 l.

"Complete terminology for free exercises, wands and dumbbells as used in the Young Men's Christian Associations."

**Mackrow, Clement, & Woolard, Lloyd.**

Naval architect's and shipbuilder's pocket-book. Ed.II. 742 p.  
Henley, \$5.

*Engineering news*, March 15, 1917, p.436. 7 l.

"British book containing sections on tabloid mathematics, weights and measures, moments of figures, mechanics, hull design, propellers, powering, properties of ship-building materials, admiralty tests, projectiles and armor, ship service equipment, Lloyd's requirements and Board of Trade requirements. A feature of this edition is a new section of aeronautics."

**McWane, R. C.**

Pipes and the public welfare. 165 p. Stirling Press, \$1.

*Power*, March 6, 1917, p.333. ⅓ col.

Contains four chapters: one on history of water pipe, one on manufacture of metal pipe, one on metal pipe deterioration and one on wood stove pipe.

**Maddox, H. A.**

Paper; its history, sources and manufacture. 160 p. Pitman, \$1.  
(Pitman's common commodities of commerce.)

*Printing art*, March 1917, p.65. ⅓ col.

"Mr. Maddox is an authority on this subject... Descriptions of the various machines and details as to their operation, full explanations of the methods employed in making handmade papers, and other interesting facts, make the book a most valuable one for the printer, the stationer, the advertising man, the engraver, the artist, the lithographer, and others, not to mention the people directly concerned with the manufacture and sale of papers."

**Mandigo, Clark R.**

Text book on brick pavements. 126 p. Western Paving Brick  
Manufacturers' Association, \$1.50.

*Good roads*, March 17, 1917, p.183. ⅓ col.

"Has been issued for 'the education of the public in the characteristics and proper construction of vitrified brick highways and city pavements.'"

**Marks, Lionel S.**

Mechanical engineers' handbook. 1,179 p. McGraw, \$5.

*Electrical world*, March 10, 1917, p.474. 1½ col.

"Based on the mechanical engineering section of the famous 'Hütte,' the German reference work generally accepted by German engineers. The material of the 'Hütte' has not been closely followed except in the more theoretical sections, the data and information on engineering practice being carefully selected from American practice."

**Marr, J. E.**

Geology of the Lake district. 240 p. Cambridge University Press, 12s. 6d.

*Mining magazine*, Feb. 1917, p.121. 1 col.

"Written...primarily for the geological student, but in such a charming and entertaining manner that it should appeal to a much wider public...From the professional viewpoint of the mining engineer and economic geologist the book is of considerable interest as a study in the relationships of geological structure and history to scenery."

**Marshall, Charles E.**

Microbiology. Ed.2. 900 p. Blakiston, \$3.

*American food journal*, March 1917, p.155. ¼ col.

"While this is a textbook, it is the sort of textbook that the lay reader finds exceptionally good reading...Consists of a number of contributions, each one coming from an authority in the division he treats."

**Martin, V. J.**

Lectures on leveling. 131 p. Kelly & Walsh, Singapore.

*Engineering news*, March 15, 1917, p.436. ¼ col.

"Most of the interest in this book to American readers lies in its curiosities. It is a very elementary and particular account of English practice and instruments."

**Mason, Harry B.**

The druggist and his profits. 127 p. E. G. Swift, Detroit, 4s.

*Pharmaceutical journal and pharmacist*, Feb. 10, 1917, p.108. ¼ col.

"The fundamental purpose of this book...is to enable the druggist to get at facts about his business, to show him what his profits really are or are not, and to assist him in bolstering up his earnings, so that at the end of the year he will come out all right."

**Mason, William P.**

Water supply. Ed.4. 528 p. Wiley, \$3.75 net.

*Science*, March 9, 1917, p.240. 1½ col.

"A large amount of the text has been entirely rewritten and suitable amount of new material added. The tables have been brought up to date and new photographs introduced." *George C. Whipple*.

**Mavor, James.**

Government telephones. 176 p. Moffat, \$1.

*Electrical age*, March 1917, p.50. ¼ col.

"The experience of the province of Manitoba, Canada, in operating its own telephone system is one which should give pause to advocates of government ownership in this country...The book is the result of a careful attempt to uncover the real facts of a most interesting experiment. On the whole it should prove a valuable contribution to general discussion of government ownership and operation."

**Mechanical world pocket diary and year book for 1917.** [Ed.30.] 264 p. Norman, Remington, \$3.35.

*Journal of the American Society of Mechanical Engineers*, March 1917, p.274. ¼ col.

"Has...been subjected to a thorough revision. The section dealing with steam and steam engines has been largely rewritten, and a new section on the heat treatment of steel has been added, as well as tables giving dimensions of piston rings and governors, and for the calculation of helical springs."

*Power*, March 6, 1917, p.333. ¼ col.

**Meyer, E. B.**

Underground transmission and distribution. 310 p. 1916. McGraw, \$3.

*Journal of the Western Society of Engineers*, Jan. 1917, p.59. ¼ p.

"Written because of repeated requests from engineers engaged in this kind of work, and because there appeared to be no work which fully covered the general field of underground construction, transmission and distribution."



**Meyers, C. J.**

Steam turbines. U. S. Naval Inst., \$4.50.

*Journal of American Society of Naval Engineers*, Feb. 1917, p.190. 1/3 p.

"Covers turbine installations in the U. S. Navy with chapters on the elementary principles of design and construction, and instructions for care and operation. Especially adapted for use as an elementary text book. . . Illustrated with 165 text figures and 9 plates 11 x 40 inches, showing half cross section of the latest Curtis and Parsons turbines."

**Miller, William J.**

Introduction to historic geology, with special reference to North America. 399 p. Van Nostrand, \$2 net.

*Science*, March 2, 1917, p.218. 5 col.

"Professor Miller has carefully compiled from recognized authorities facts and figures illustrative of historical geology as now understood. He is no iconoclast. He has apparently felt the need of a systematic tabulation of topics, serving as a groundwork for a series of lectures in historic geology. This with minor expansions and articulations forms the text-book before us." *G. D. Harris*.

**Mills, Clifford Newton.**

Elementary mechanics for engineers. 127 p. Van Nostrand, \$1.

*Journal of the American Society of Mechanical Engineers*, March 1917, p.274. 1/2 col.

"The course given in this book is designed to form the basis for a semester's work of three hours per week, and presupposes a mathematical preparation on the part of the student that includes trigonometry."

**Montgrand, L. de.**

Automobiles, camions et tracteurs. Berger-Levrault, 7 fr. 50.

*Le Génie civil*, Feb. 10, 1917, p.104. 1/3 col.

**Moon, Frederick Franklin.**

Book of forestry. 315 p. Appleton, \$2.

*Engineering news*, March 15, 1917, p.437. 1/4 col.

"Principles and practices of forestry with attention to the conservation and use of natural resources are simply and entertainingly outlined in this volume. Although designed more particularly for youthful readers the book is suitable for persons of any age who wish to get a general view of forestry."

**Moses, A. J. & Parsons, C. L.**

Elements of mineralogy, crystallography, and blowpipe analysis.

Ed.5. 631 p. 1916. Van Nostrand, \$3.

*Mining and scientific press*, March 17, 1917, p.394. 1/3 col.

"Enlarged (200 pages more) and extensively rewritten. The practical standpoint of former editions is maintained."

**Moulton, Forrest Ray.**

Introduction to astronomy. New & rev. ed. 577 p. Macmillan, \$2.25.

*Popular astronomy*, March 1917, p.217. 1/3 p.

"Those teachers who have been using Moulton's earlier book with the same title will welcome this edition. It is not merely a revision. . . bringing the various paragraphs up to date, but the entire book has been rewritten and some important modifications have been made. . . Most of the chapters have been enlarged, especially the last, on the Sidereal Universe."

**Mulliken, Samuel Parsons.**

A method for the identification of pure organic compounds. v.2. 327 p. 1916. Chapman, 21s. net.

*Pharmaceutical journal and pharmacist*, Feb. 10, 1917, p.108. 1 col.

"The method which is the basis of this book is a 'systematic analytical procedure based on physical properties and chemical reactions' . . . It is perhaps impossible to give anything like an adequate idea of the aim of this work, since only the second volume of the four which complete it has been submitted to us. . . One imagines that the complete work will be of particular value to research chemists and analysts."

**Murray, Athole J.**

Strength of ships. 400 p. Longmans, \$5 net.

*Journal of the American Society of Naval Engineers*, Feb. 1917, p.190.  $\frac{1}{3}$  p.

"Thoroughly covers the materials used in ship construction and the principles of design for strength of the component parts of the ships, of the ship as a whole, and of the rigging and outboard fittings... Well printed and illustrated, and should be of value as a reference book and a text book for advanced students."

*Power*, March 6, 1917, p.333.  $\frac{1}{3}$  col.

"Deals wholly with the strength of the materials composing the hull structure and the manner of making riveted joints, etc."

**National Board of Fire Underwriters.**

Dwelling houses; a code of suggestions for construction and fire protection. 115 p. The Board.

*Concrete and constructional engineering*, Feb. 1917, p.105.  $\frac{3}{4}$  col.

"Published... as the result of requests... for construction specifications which will properly protect dwelling-houses against fire... Intended for the use of owners and builders."

**Neil, Marion Harris.**

Ryzon baking book. 80 p. General Chemical Co., New York, \$1.

*American food journal*, March 1917, p.155.  $\frac{1}{2}$  col.

"Recipes recommended for use with Ryzon Baking Powder."

**Nobili, Dino.**

Gli strumenti per misure elettriche industriali. 501 p. Rivista Tecnica di Elettricit , Milan, \$2.

*Electrical review and western electrician*, March 17, 1917, p.462.  $2\frac{1}{4}$  col.

"Compendium of the art of making industrial electrical measurements... The subject has fallen into the hands of an expert... If it were published in English, would undoubtedly prove interesting to a large circle of readers. Unfortunately, its translation would be a rather troublesome and tedious task." *C. O. Mailloux*.

**Noyes, W. A.**

Organic chemistry for the laboratory. Ed.3, rev. & enl. 292 p. 1916. Chemical, \$2.

*Ice and refrigeration*, March 1917, p.158.  $\frac{1}{4}$  col.

"Differs but little from previous edition, except for some corrections or changes to conform to later work... The work is intended to furnish the beginner with sufficiently full and accurate directions and theoretical explanations of processes which have been found to be successful in a chemical laboratory."

**Oswald, John Clyde.**

Benjamin Franklin, printer. Doubleday, \$2.

*Inland printer*, March 1917, p.816.  $\frac{3}{4}$  col.

"Should prove of extreme interest to printers throughout the country, inasmuch as it is the first book dealing with their patron saint from the standpoint of his connection with printing."

**Park, James.**

Text book of practical hydraulics. 1916. Griffin, 12s. 6d.

*Concrete and constructional engineering*, Feb. 1917, p.104. 3 col.

"Is admirably suited for students... but it is also likely to prove of even greater value to those engineers who require a ready work of reference... Contains a large number of tables of great importance for reference purposes... is well arranged and has a good index."

**Peirce, Clarence A. & Carver, W. B.**

Handbook of formulas and tables for engineers. Ed.2. 188 p. McGraw, \$1.50.

*Engineering-education*, Feb. 1917, p.346.  $\frac{1}{2}$  p.

"As a handy book for field engineers or as a syllabus for engineering students, it may fill a need that is hardly met in any other publication."

**Penman, David.**

Compressed air practice in mining. Griffin, 5s. net.

*Iron and coal trades review*, Feb. 2, 1917, p.129. ¼ col.

"As a text book the present treatise will, no doubt, prove very useful, as it is based upon lectures given by the author at a mining school."

**Pickering, J. C.**

Engineering analysis of a mining share. 95 p. 1917. McGraw, \$1.50.

*Engineering news*, March 15, 1917, p.436. ¼ col.

"Confined to gold, copper, silver, lead and zinc. Of special worth is the chapter that deals with the determination of the value of a mine or mining share."

*Mining and scientific press*, March 17, 1917, p.394. ¼ col.

"An interesting and a useful book. It would have been better if it had been edited carefully and if a wider reference had been made to other writings on the subject... His style is pleasant, his judgement appears sound, and his whole treatment of the subject is well worthy of an experienced engineer." *T. A. R.*

**Practical engineer electrical pocket book and diary.** 1917. Tech. Pub. Co., 1s.

*Engineer*, Feb. 16, 1917, p.159. ¼ col.

**Practical engineer mechanical pocket book and diary.** 1917. Tech. Pub. Co., 1s.

*Engineer*, Feb. 16, 1917, p.159. ¼ col.

"The subject matter has been thoroughly revised and brought up to date."

**Pratt, Edwin A.**

Rise of rail power in war and conquest. 405 p. P. S. King & Son, Ltd., 7s. 6d.

*Engineer*, Feb. 2, 1917, p.113. ¾ col.

"Every relation of railways to war is covered."

**Price, George M.**

The modern factory. 574 p. Wiley, \$4 net.

*Heating and ventilating magazine*, March 1917, p.54. ½ col.

"Factory conditions as they are and as they should be... An important work by George M. Price, M. D., formerly director of investigation for the New York State Factory Commission and now director of the joint board of sanitary control in the cloak, suit and skirt, and the dress waist industries, New York City."

**Proud, E. Dorothea.**

Welfare work; employers' experiments for improving working conditions in factories. 1916. G. Bell, 7s. 6d. net.

*Engineering*, Feb. 16, 1917, p.161. 2¾ col.

"Discusses many details that affect the lives and well-being, physical and mental, of operatives, as well as those sources of friction that so frequently lead to industrial disputes."

**Pull, Ernest.**

Modern workshop practice. Ed.3. 350 p. Crosby Lockwood, 5s. net.

*Model engineer and electrician*, Feb. 22, 1917, p.124. ¼ col.

"A fund of practical workshop information which should be of much value to the engineering student and apprentice... Covers all branches of fitting and machine shop work, and is profusely illustrated."

**Railway carriage and wagon builders' pocket book and diary.** Locomotive Publishing Co., 2s. 6d.

*Engineer*, Feb. 16, 1917, p.159. ¼ col.



**Railway Equipment & Publication Company.**

Railway freight connections and car interchange points. 80 p.  
The Company, \$.40.

*Railway age gazette*, March 2, 1917, p.343. ¼ col.

"Made up from the well-known data contained in the monthly Railway Equipment Register...A convenient handbook free from that bulky material in the Register to which reference has to be made less frequently."

Railway signal and permanent way engineer's pocket book. 260 p.  
Spou, 2s. 6d. net.

*Model engineer and electrician*, Feb. 22, 1917, p.124. ½ col.

"Deals with fixed signals, Board of Trade requirements, description of various types of signals, signal boxes, signal lighting, signalling systems, track circuits and automatic signals, the block system, cab signalling and automatic train control...and the electrical equipment of railway tracks relative to permanent way maintenance."

**Rathery, F. and others.**

Les fièvres paratyphoïdes B à l'hôpital mixte de Zuydcoote de décembre 1914 à février 1916. 248 p. 1916. Alcan, Paris, 9 fr.

*Revue générale des sciences pures et appliquées*, Jan. 30, 1917, p.60. ¼ col.

**Ries, Heinrich.**

Economic geology. Ed.4, rewritten. 856 p. 1916. Wiley, \$4.

*American journal of science*, March 1917, p.252. 1 p.

"The illustrations, tables and bibliography are commendable and the volume indicates discrimination and judgment on the part of the author in the selection of the subject matter. The book is the only one of its kind that covers the whole field of geology and will be of great value to teacher and student...While the treatment of Part II leaves much to be desired the book as a whole is bound to have a wide use as a text book in the United States and Canada." *A. M. Bateman.*

**Roe, Joseph Wickham.**

English and American tool builders. Yale University Press, \$3.

*American industries*, March 1917, p.42. 1 col.

"Should be in the library of every manufacturer of machine-tools and every Engineering Society."

**Rowland, Arthur J.**

Applied electricity for practical men. 375 p. McGraw, \$2.

*Electrical age*, March 1917, p.49. ½ col.

"Very little theory is given, and design is not touched on, since the book is intended for the man who installs and operates apparatus...A good feature of the book is the number of diagrams and illustrations, which are compact, and yet illustrate well the points involved...We are glad to recommend this work as a book of general reference to electrical principles."

*Engineering-education*, Feb. 1917, p.345. 4 l.

"Of particular interest to instructors and students in industrial and trade schools. A text on practical electricity free from unnecessary theory, including lists of well chosen problems covering the work of each chapter."

**Sabin, Alvah Horton.**

Industrial and artistic technology of paint and varnish. Ed.2.  
473 p. Wiley, \$3.50.

*Engineering news*, March 15, 1917, p.437. ¾ col.

"Is labeled a second edition, but it is virtually a new book...This second edition is a great deal better than the first one for the peculiar reason that, not being any longer a varnish man, the author feels free to speak more openly of the varnish business and, now being a paint man he knows more about the paint business than before."

**Sales Service Company.**

Selling your services. 176 p. Sales Service Co., \$1 net.

*Foundry*, March 1917, p.93. 1 col.

*Iron age*, March 8, 1917, p.606. ¼ col.

"Applies methods of selling to the seeking of a job."

*Journal of the American Society of Mechanical Engineers*, March 1917, p.275. ¼ col.

"It is the belief of the authors, whose names are not disclosed, that a man's services

**Sales Service Company—continued.**

are to be marketed to the best advantage by employing the same selling principles that have proved successful in the disposition of other commodities, and with this in mind they have outlined the systematic methods of campaigning which they themselves followed in securing positions of responsibility."

**Schuchert, Charles.**

Text-book of geology. pt.2: Historical geology. p.405-1026. 1915. Wiley, 12s. net.

*Geological magazine*, Feb. 1917, p.84. 1½ p.

"Meant to be a guide for American students, and for such a purpose it seems well adapted...An original and stimulating book, where fact and theory are happily mingled, and the tangled threads of many complicated series of events reduced to an orderly and attractive pattern."

**Scovell, Clinton H.**

Cost accounting and burden application. 328 p. Appleton, \$2.

*American machinist*, March 1, 1917, p.396. ½ col.

"So much has been written on cost accounting that a new book in this field must justify itself by new material, a fresh view-point or improved method of treatment. The volume under review does not seem to have any one of these three desirable characteristics...However there is one saving feature...and that is Chapter VII, 'Interest Charged to Cost.'"

**Seabrook, Edwin L.**

How to make the business pay, with special reference to the sheet metal business. 173 p. Sheet Metal Pub. Co., \$2.

*Heating and ventilating magazine*, March 1917, p.55. ½ col.

"Is also intended to apply to the business of heating, plumbing, electrical and building contractors. It contains methods for ascertaining the cost of conducting business, estimating on contracts, bookkeeping, conducting collections and credits, publicity and business correspondence, and securing and retaining customers."

**Seaton, Roy A.**

Concrete construction for rural communities. 223 p. McGraw.

*Concrete and constructional engineering*, Feb. 1917, p.103. ¾ col.

"This book, which forms one of the Agricultural Engineering Series, is of particular interest...Is well written, and deserves to be read by all those who are interested in the problem of executing work in rural districts at a reasonable cost."

**Slocum, S. E.**

Elements of hydraulics. Ed.2. 329 p. McGraw, \$2.50.

*Engineering news*, March 15, 1917, p.435. ½ col.

"In its general structure and main details the book remains much as it was before... The text is greatly improved and strengthened by inserting a discussion on the use of exponential formulas for flow of water. There are additions on strength of pipe, flow over weirs, siphons, water hammer, and surge-tank problems."

**Smith, D. & Pickworth, P. C. N.**

Engineers' costs and economical workshop production. Ed.2. Emmott, 4s. 6d. net.

*Engineer*, Feb. 2, 1917, p.113. ¾ col.

"In every way to be recommended to those requiring a treatise on its subject, written from the engineer's rather than from the accountant's standpoint."

**Smith, William Griswold.**

Practical descriptive geometry. 256 p. 1916. McGraw, \$2.

*Engineering-education*, Feb. 1917, p.346. ¾ p.

"Undoubtedly one of the best published on descriptive geometry."

**Sprague, Ernest H.**

Elementary mathematics for engineers. 244 p. 1916. Scott, Greenwood, 4s. net. (Broadway series of engineering handbooks, v.21.)

*Engineering*, Feb. 2, 1917, p.96. 1½ col.

"Deliberately invites the practical man to be content with a minimum of mathe-

**Sprague, Ernest H.—continued.**

matical information. . . We should imagine that a student after going through this course would be in the same position as one who having learnt something of the Latin Grammar, and armed with a small vocabulary, finds himself face to face with Horace, endeavoring to appreciate the charm of the classic page."

*Scientific American*, Feb. 17, 1917, p.189. ¼ col.

"The author's selective treatment of those parts which he has found by experience to be of the most practical use should prove valuable to the man of limited time."

**Stillman, Thomas B.**

Engineering chemistry. Ed.5. 760 p. 1916. Chemical, \$5.

*Ice and refrigeration*, March 1917, p.158. ¼ col.

"The fifth edition of Prof. Stillman's notable work on engineering chemistry, was nearing completion when on August 10, 1915, the author died. . . This new revised volume. . . was completed by Albert Stillman, assisted by a group of friends and co-workers of the dead author. . . In addition to revision. . . considerable new material has been added in this edition."

**Taylor, Jay L. B.**

Handbook for rangers and woodsmen. 420 p. 1917. Wiley.

*Journal of forestry*, Jan. 1917, p.124. ½ p.

"This handbook is welcomed as a most valuable addition to our forest literature, since it is believed that it will be of inestimable value to both those who are just starting in the profession and to the older men who want a reference work on the various practical subjects covered." *R. C. B.*

**Thoday, D.**

Botany; a text-book for senior students. 474 p. 1915. Cambridge University Press, 5s. 6d.

*Nature*, Feb. 22, 1917, p.485. ¼ col.

"Primarily for. . . Senior Cambridge Local Examinations. . . There is a certain refreshing originality of treatment in dealing with the common objects of the examination syllabus, and the matter is well and clearly written; it is, in fact, a readable textbook."

**Thompson, A. Beeby.**

Oil-field development and petroleum mining. 648 p. 1916. Crosby Lockwood, 25s. net.

*Nature*, Feb. 1, 1917, p.425. 2 col.

"Practically a second edition of the author's previous volume on the same subject. . . It is, however, by no means a mere reprint, extensive alterations having been effected by correction, addition and excision. . . A useful treatise on the branches to which the author has devoted special attention."

**Voorhees, E. B.**

Fertilizers; rev. ed. by J. H. Voorhees. 365 p. 1916. Macmillan, 6s. 6d. net.

*Nature*, Feb. 8, 1917, p.446. ¾ col.

"Treatment is general rather than special, and only few references to original papers or bulletins are given. . . The book retains its distinguishing features and will no doubt prove helpful to the type of student who used the previous edition."

**Waddell, J. A. L.**

Bridge engineering. 2v. 1916. Wiley, \$10 net.

*Proceedings of the Engineers' Society of Western Pennsylvania*, Jan. 1917, p.62. 1 p.

"His clear and convincing style of writing, backed up by his broad and varied experience, makes the reading of this book a pleasure, as well as a source of inspiration and knowledge."

*Technology monthly and Harvard engineering journal*, March 1917, p.28. 2 p.

"Dr. Waddell writes in no stiff, pedantic, academic fashion, but in an easy, conversational manner he gives the reader freely from the abundance of his professional experience. The work also represents a very large amount of research investigation in the tabulation of data and the preparation of tables and diagrams in convenient form for use." *G. F. Swain.*



**Ward, Artemas, comp.**

Encyclopedia of foods and beverages. 748 p. Author, New York, \$10.

*American food journal*, March 1917, p.154. 1½ col.

"This is a most valuable book and should be in the hands of every one interested in the handling and sale of food products."

**Webner, Frank E.**

Factory accounting. 341 p. La Salle Extension University, \$3.30.

*Iron age*, March 1917, p.530. 1 col.

"Vivid exposition of factory organization, methods and technique is offered in this most complete book by Mr. Webner, whose style of writing brings out clearly the weave of an intricate subject."

**Webster, A. D.**

Tree wounds and diseases; their prevention and treatment, with a special chapter on fruit trees. 215 p. 1916. Williams & N., 7s. 6d. net.

*Nature*, Feb. 1, 1917, p.427. 1 col.

"Popular account of the nature and treatment of the ailments and injuries to which trees are liable, and may serve as an introduction to more scientific treatises. . . Is useful as directing the attention of landowners and other non-professional readers to the many preventable causes which spoil the appearance and ultimately cause the death of much ornamental timber in Britain."

*Revue générale des sciences pures et appliquées*, Jan. 30, 1917, p.60. 1½ col.

**Weed, Walter Harvey.**

Mines handbook. 1,700 p. Stevens Copper Hdbk., 42s. net.

*Mining magazine*, Feb. 1917, p.121. 7 l.

"Confined to companies known in North America, and the scope has been widened so as to include all non-ferrous metal mines."

**Williams, Clement C.**

Design of railway location. 510 p. 1917. Wiley.

*Journal of the Western Society of Engineers*, Jan. 1917, p.59. ¾ p.

"Intended as a text-book for technical schools, but the author expresses a hope that it will be found useful to engineers in practical railroad work. It undertakes to develop underlying principles. . . Well written and should be generally useful, not only as a text-book but for general study and reference."

**Winter, John Garrett, & Hobbs, W. H.**

The prodromus of Nicolaus Stenö's dissertation concerning a solid body enclosed by process of nature within a solid. 124 p. 1916. Macmillan. (University of Michigan studies, Humanistic series, v.11, pt.2.)

*American journal of science*, March 1917, p.250. ⅓ p.

"Remarkable in its record of geological observations and the sound induction from them to principles concerning the nature of strata, fossils, crystals, and mountains." *J. B.*

**Woods, Clinton E.**

Unified accounting methods for industrials. 466 p. Ronald Press, \$5.

*Iron age*, March 8, 1917, p.605. ⅓ col.

"Written for the executive, engineer and accountant, who together are responsible for the general efficiency of a management system. . . Gives a clear and interesting exposition of the subject, is carefully compiled and neatly arranged."

**Woodworth, Joseph.**

L'outillage américain pour la fabrication en série; emploi des montages pour économiser la main-d'œuvre spécialiste sur les différents types de machine-outils; 2d Amer. ed. tr. by Maurice Varinois. 458 p. Dunod & Pinat, Paris, 22 fr.

*Le Génie civil*, Feb. 10, 1917, p.104. ½ col.

**Wynne, Walter E. & Spraragen, William.**

Handbook of engineering mathematics. 220 p. Van Nostrand, \$2.

*Journal of the American Society of Mechanical Engineers*, March 1917, p.274. ¼ col.

"Intended primarily for students in engineering schools, and the authors have endeavored to make it a handy means of reference to the theoretical and applied mathematics used in engineering."



vol. 1 no. 3

67

THE UNIVERSITY OF CHICAGO

1912

1912

OF 100

Library of the  
University of Chicago  
Chicago, Ill.  
1912



THE UNIVERSITY OF CHICAGO  
LIBRARY

P  
B6  
-

69

TECHNICAL BOOK REVIEW INDEX

VOL.1

NO.3

(May 1917)

Extracted from  
Carnegie  
Library of Pittsburgh

Monthly  
bulletin  
Vol 22 # 5  
pp 442-

THE UNIVERSITY OF CHICAGO

1911





**Miller, Warren Hastings.**

j 799 M69

The boys' book of hunting and fishing; practical camping-out, game-fishing and wing-shooting; foreword by Dan Beard. 1916. Doran.

**Pogány, Nandor, comp.**

j 398 P74

Hungarian fairy book; illustrations by Willy Pogány. [1913.] Unwin.

**Shakespeare, William.**

qj 822.33 P74

Comedy of a Midsummer-night's dream, with illustrations by W. H. Robinson. 1914. Holt.

**Twain, Mark, (*pseud.* of Samuel Langhorne Clemens).**

j 92 T897p

Paine, Albert Bigelow. The boys' life of Mark Twain; the story of a man who made the world laugh and love him. 1916. Harper.

Born in the humblest surroundings and brought up almost without schooling, Mark Twain lived to achieve a world-wide fame. This account of his life by his friend and biographer tells of his boyhood in a little town on the Mississippi, of the adventures of the real Tom Sawyer and his band, of his experiences as printer's apprentice, pilot and miner, and of his later literary success.

## Technical Book Review Index

This index, printed from part of a card-index maintained by the Carnegie Library of Pittsburgh, is a record of certain book reviews appearing in the scientific, technical and trade journals currently received in the Technology Department. It is concerned mainly with books on pure and applied science, but includes a few on allied subjects. Its purpose is primarily to *index* reviews rather than to compete with any existing booklist by suggesting books on any subject, or by furnishing bibliographic information. In accordance with this plan, the arrangement is by authors, though the form of entry, being determined from the review and not from the book itself, is in some cases doubtless incorrect.

Except for the correction of obvious errors, the bibliographic information is as given in the review, or as combined from two or more reviews when several are indexed. Since many of the reviews are carelessly done, the information given is, in many cases, both inaccurate and incomplete. In general the names of publishers are abbreviated in accordance with the practice in the more important book-trade bibliographies. Titles of journals are as a rule given in full.

Each quotation immediately follows the name of the journal from which it is taken. Obviously these brief extracts, when thus detached from the context, must not be accepted as conclusive. Very often a review is so equivocal that there can be no unanimity of opinion as to whether it is favorable or unfavorable. For this reason no estimate is given here. Except for this one omission, this index is an exact copy of cards filed in the book review index of the Carnegie Library of Pittsburgh.

The "Technical Book Review Index," published in April and July 1915 by the Index Office, Inc., Chicago, consisted of a record of technical book reviews furnished by the Carnegie Library of Pittsburgh.

The Technical Book Review Index to be published by this Library begins with the year 1917, the first instalment having appeared in the Monthly Bulletin for March.

**Inventory** of engineering handbooks, from Haswell's pioneer work in 1844 to the numerous productions of 1916, by R. Fleming. (In Engineering news-record, April 19, 1917, p.148-150.)

A list of "handbooks" dealing with various branches of engineering. Some sixty titles are mentioned, foreign books being included. Brief bibliographic information is given, but no evaluation is attempted. Author suggests the term "reference book" as more appropriate than "pocket-book" or "handbook" for many of the works cited.

**Acheson, Arthur.**

Trade-mark advertising as an investment. 46 p. N. Y. Evening Post, \$1.

*Inland printer*, April 1917, p.104.  $\frac{1}{3}$  col.

"Mr. Acheson presents in this volume matter which he has used in slightly different form in soliciting business from advertisers... The theory here presented regarding trade-mark advertising is not dependent upon the use of any one medium, but is applicable in some measure to all mediums."

**[Alford, Leon Pratt.]**

Manufacture of artillery ammunition. 765 p. 1917. McGraw, \$6 net.

*Iron trade review*, March 29, 1917, p.732. 1 col.

"A very interesting and valuable book."

**Annales du service des epiphyties.** v.3. 400 p. 1916. Lhomme, Paris, 20 fr.

*Revue générale des sciences pures et appliquées*, Feb. 15, 1917, p.90. 1 col.

**Atkins, W. R. G.**

Some recent researches in plant physiology. 328 p. 1916. Whitaker, 7s. 6d. net.

*Nature*, Feb. 22, 1917, p.485.  $\frac{1}{2}$  col.

"Aims at presenting to senior students and investigators the results of recent work in a few of those branches which are at present attracting attention. It is supplementary to the text-books, and should prove of great value to those whom the subject most nearly concerns."

**Austin, F. E.**

Preliminary mathematics. 170 p. Author, Hanover, N. H., \$1.20.

*Railway mechanical engineer*, April 1917, p.175.  $\frac{1}{3}$  col.

"A book which will furnish a connecting link between arithmetic and algebra has been badly needed. Prof. Austin has tried to show the connection between the common operations of arithmetic and the corresponding algebraic processes so as to make it easy for the student to gain a practical knowledge of algebra and its application."

*Telephony*, April 7, 1917, p.46.  $\frac{1}{3}$  col.

"Designed to be a...connecting link between the study of arithmetic and the study of algebra. The main object...is to show how to solve problems...Useful to one who has not had the advantages of school and wishes to take up arithmetic and algebra by himself."

**Aydelotte, Frank, ed.**

English and engineering. 390 p. McGraw, \$1.50.

*Mining and scientific press*, April 7, 1917, p.496.  $\frac{1}{4}$  col.

"A collection of examples of good writing, intended 'to help technical students in expressing themselves better in writing and speaking.'" T. A. R.

**Bailey, L. H.**

Standard cyclopedia of horticulture. v.3, 559 p.; v.4, 660 p. 1915-16.

Macmillan, 25s. net each.

v.3. F-K.

v.4. L-O.

*Nature*, March 8, 1917, p.22.  $\frac{2}{3}$  col.

"The sections treating of tools and machinery are particularly well done... We commend the account given of the horticulture experiment stations in the various States to the particular attention of those whose business it is to give State encouragement to horticultural research in this country [England]... The 'Cyclopaedia' is well and copiously illustrated; the black-and-white figures are excellent. The coloured plates, however, are, as is so often the case, of unequal merit."

**Baker, Muriel A. comp.**

Decennial index of the Analyst, the journal of the Society of Public Analysts and other analytical chemists, v.31-40 (1906-1915). 733 p.

£1, 1s.

*Journal of the American Chemical Society*, April 1917, p.838.  $\frac{2}{3}$  p.



**Baldt, Laura I.**

Clothing for women. 454 p. 1916. Lippincott, \$2.

*Journal of home economics*, April 1917, p.189. 1½ col.

"Miss Baldt has given to the teachers of home economics and vocational subjects a book long needed and eagerly looked for. While written primarily with college classes in view it can be adapted easily to the use of students in the high school and to women in the home." *Mary Schenck Woolman*.

**Barker, Harry.**

Public utility rates. 387 p. McGraw, \$4 net.

*Municipal journal*, April 12, 1917, p.539. 1½ col.

"What is needed to save the observer from being swamped with facts in decisions and froth in partisan theories is just such a clear and unbiased analysis as Mr. Barker's work... The volume is the result of painstaking editorial observation over a period of eight years... Where there are two sides to a question each is given a fair statement."

**Battle, J. R.**

Lubricating engineer's handbook. 333 p. 1916. Lippincott, \$4.

*American machinist*, March 22, 1917, p.528. ½ col.

"Reference book of data, tables and general information for the use of lubricating engineers, oil salesmen, operating engineers, mill and power plant superintendents and machinery designers, etc... Contains a lot of valuable data and general information and will no doubt find a field of usefulness among those it is intended to serve."

*Power*, April 3, 1917, p.469. ½ col.

**Bennett, R. J.**

Corporation accounting. Ronald. (Ronald accounting series.)

*Journal of accountancy*, April 1917, p.319. 2 p.

"Written for corporation accountants and of interest to public accountants and to students preparing for C. P. A. examinations... As a compendium of corporation accounting practice the book is concise yet comprehensive; and if the test of a good textbook is the harmonious and scientific application of sound theory to actual conditions and practice; the author may felicitate himself upon having contributed a standard work to accounting literature."

**Blasdale, Walter C.**

Principles of quantitative analysis. Ed.2. 388 p. 1917. Van Nostrand, \$2.50 net.

*Journal of the Franklin Institute*, April 1917, p.522. ½ p.

"A second edition that follows the first in about two years needs no special encomiums from a reviewer, for it is evident that the work has been acceptable to those for whom it was intended. The book is written in full accord with the modern theories of physical chemistry, and illustrates vividly how useful these theories are in their practical application. The subject matter is largely concerned with inorganic chemistry, but a few processes that are usually included in commercial organic analysis are given." *Henry Leffmann*.

**Bliss, A. R. jr. & Olive, A. H.**

Text-book of physics and chemistry for nurses. Lippincott, \$1.50.

*American journal of nursing*, March 1917, p.565. 7 l.

"Subject-matter... is presented in a different manner from any at hand, and is the result of years of teaching in schools of nursing."

**Blumgarten, A. S.**

Materia medica for nurses. Ed.2, rev. & enl. 1916. Macmillan, \$2.50.

*American journal of nursing*, March 1917, p.566. ½ p.

"This edition contains but few more pages, but the arrangement of the subject-matter has been changed. While very complete and valuable, the book is designed for teaching and reference rather than for nurses in private practice, owing to its size and weight."

**Blumgarten, A. S.**

Teacher's guide for Materia medica for nurses. Macmillan, \$2.00.

*American journal of nursing*, March 1917, p.566. ½ p.

"As the name implies this pamphlet is to be used in connection with the author's textbook for the instruction of students. The subject is made interesting by its methods, and the suggestions it offers are practical."

**Bolduan, Charles F. & Grund, Marie.**

Applied bacteriology for nurses. Ed.2, rev. Saunders, \$1.50.

*American journal of nursing*, April 1917, p.667. 7 l.

"Reviewed in our columns... in 1913... With the exception of the addition of chapters on inflammation and fumigation, a note on the pathology of the more important infections, and the brief mention of recent scientific discoveries, the new edition contains but few changes."

**Bond, A. Russell.**

On the battle front of engineering. 300 p. 1916. Century, \$1.30 net.

*Scientific American*, April 14, 1917, p.380. ½ col.

"Seldom do we find a book for boys written with so ingenious a blending of story and instruction... The narrative is at once clever and sincere, and will prove an excellent stimulant for the latent forces of the growing mind."

**Bragg, Edward M.**

Design of marine engines and auxiliaries. 183 p. 1916. Van Nostrand, \$3 net.

*International marine engineering*, April 1917, p.190. ½ col.

"An enlargement of a previous work by the same author which originally appeared as a serial in *Marine Engineering*... Designers of marine machinery will find the work of great value as well as students or draftsmen who are taking up engine work in shipyards."

**Braithwaite, J. O. & Bennett, R. R. ed.**

Year-book of pharmacy. 572 p. 1916. Churchill, 10s. net.

*Pharmaceutical journal and pharmacist*, Feb. 24, 1917, p.160. ½ col.

"Contents of the book remain as usual... The contents in their entirety are beyond reproach, and reflect the greatest credit on the editors."

**Brown, Harold W.**

Electrical equipment. 229 p. 1917. McGraw, \$2.

*Power*, March 20, 1917, p.400. ¾ col.

"Treats of electrical equipment, its selection and arrangement with special reference to factories, shops and industrial plants... Primarily intended to guide college students in laying out their work and to assist mechanical and electrical engineers in selecting electrical equipment, and in this capacity it should find a wide field of usefulness."

**Bruce, J. Mitchell, and others.**

Materia medica and therapeutics. Ed.10. 1915. Cassell, 6s. 6d. net.

*Analyst*, Feb. 1917, p.64. 1 p.

"Practically a new book, and is a great improvement on previous editions... Reference is made to most or all of the important synthetic remedies of recent introduction... One of the best of its kind and valuable to students." *Francis H. Carr*.

**Burdick, Arthur J.**

Chemical tests for minerals. 93 p. Gateway Pub. Co., Beaumont, Cal., \$1.25.

*Metallurgical and chemical engineering*, April 15, 1917, p.457. ½ col.

"Is described as an aid for the prospector in testing his samples qualitatively on the ground and has been written with that end in view. It gives descriptions of the various ores and specific tests for each of the minerals separately, and the method and tests necessary for making a general examination of the ore. A description is given of the outfit required and considerable helpful general information."

*Mining and scientific press*, April 7, 1917, p.496. 10 l.

"Designed to meet the requirements of prospectors who want to be able to recognize the minerals they find while searching among the hills... Is well arranged and is in such form that almost anyone of intelligence can apply the tests suggested, and thus get the desired results."

**Bureau of Railway Economics, Washington, D. C.**

List of publications pertaining to government ownership of rail-ways. Ed.4, rev. 100 p. The Bureau, Washington, D. C. (Bulletin no.62.)

*Railway age gazette*, April 6, 1917, p.729. 11 l.

"Every effort has been made to include references to all the available literature on the subject—good, bad and indifferent—for and against government ownership, although no attempt has been made to include references to the larger subject of the relation of railways to the state or to books and articles that are merely descriptive of state rail-roads...Classified by countries and by states in the United States."

**Burley, George W.**

Testing of machine tools. Scott, Greenwood, 4s. net. (Broadway series of engineering handbooks.)

*Engineering*, March 2, 1917, p.208. 1½ col.

"Designed to deal with the various aspects of machine-tool testing in such a way as to make the book suitable for engineer apprentices and students as well as responsible engineers."

**Burne, S. A. H. and others, ed.**

North Staffordshire Field Club; jubilee volume, 1865-1915. Mort, 7s. 6d.

*Nature*, Feb. 22, 1917, p.488. ½ col.

"A commemorative volume, which consists of a sufficiently full record of the work performed by the members during the fifty years of its existence, compiled by the presi-dent, together with an account of the work done in the various sections by the respec-tive chairmen."

**Butler, Edward.**

Vaporizing of paraffin for high-speed motors. 120 p. Griffin, 3s. 6d. net.

*Ironmonger*, March 24, 1917, p.186. ½ col.

"In view of the shortage of petrol, singularly opportune. The author's previous record as a writer on internal combustion engines and allied matters is a sufficient guarantee that his new work is a careful and thorough survey of available apparatus."

**Butler, George F. & Evans, W. A.**

Materia medica and therapeutics, preventive medicine. 1916. Year Book Pub. Co., \$1.50. (Practical medicine series.)

*St. Paul medical journal*, March 1917, p.100. ½ col.

"About half of the volume is given over to Preventive Medicine. Among the many other topics, Infantile Paralysis...deserves special mention." *J. C. Michael*.

**Cain, William.**

Earth pressure, retaining walls, and bins. 287 p. 1916. Wiley, 10s. 6d. net.

*Nature*, Feb. 22, 1917, p.486. ½ col.

"Deals with the theory of soil pressures, covering a wide range of physical prop-erties of earth."

**Campbell, Edward D.**

History of the chemical laboratory of the University of Michigan. 166 p. University of Michigan.

*Journal of the American Chemical Society*, April 1917, p.837. ½ p.

"The main part of the book, 142 pages, is made up of a roster of all the men who have been on the instructional staff with a list of the scientific papers published by each." *S. W. Parr*.

**Carleton, Mark A.**

The small grains. 699 p. 1916. Macmillan, 7s. 6d. net.

*Nature*, March 8, 1917, p.22. ¾ col.

"Although Prof. Carleton's work is designed primarily for the American agron-



**Carleton, Mark A.—continued.**

omist, it is one which the scientific agriculturists of this country [England] will be glad to have if only for the somewhat remarkable manner in which the author contrives to give a bird's-eye view of the vast area and diverse conditions over and under which the 'small grains' are cultivated in the United States."

**Cattolica, P. Leonardi, & Luria, A.**

Fari e segnali marittimi. [Rewritten & enl.] 2v. 1916. Simondetti, Turin, Italy.

*Engineer*, March 9, 1917, p.218. 2 col.

"An engineering and optical treatise, and does not pretend to be in any way a popular account of lighthouse engineering. The lengthy bibliography which prefaces the first volume...indicates the sources from which the authors have drawn the bulk of their material...A standard treatise of international interest."

**Charnock, G. F.**

Mechanical technology; being a treatise on the materials and preparatory processes of the mechanical industries. 635 p. 1916. Constable, 7s. 6d.

*Revue générale des sciences pures et appliquées*, Feb. 15, 1917, p.90. 1½ col.

**Chemical Catalogue Company.**

Chemical engineering catalogue. 288 p. The Company, New York.

*American food journal*, April 1917, p.211. ¼ col.

"Very useful catalogue, being a pretentious book of references for chemical engineers and all others who desire information on chemical equipment and supplies."

**Chemical Rubber Company.**

Handbook of chemistry and physics. Ed.5. 414 p. The Company, Cleveland, \$2.

*India rubber world*, April 1, 1917, p.400. ¼ col.

"A favorite ready reference book of chemical and physical data...Although small enough to fit easily in the pocket, it is packed full of chemical and physical facts and tables, so arranged as to be readily found. The present edition is about 60 pages larger than the previous one."

*Journal of the American Chemical Society*, April 1917, p.839. ⅓ p.

"This handy book contains data in part of the same sort as those which are given in 'Chemiker-Kalender.'" *W. A. Noyes*.

**Church, A. Hamilton.**

Manufacturing costs and accounts. 447 p. McGraw, \$5.

*India rubber world*, April 1, 1917, p.400. ⅓ col.

"Very exhaustive treatise as to the proper methods of keeping cost accounts in so simple a manner as to be readily understood."

*Journal of the American Society of Mechanical Engineers*, April 1917, p.369.

"Concerned wholly with the principles of costing, their application under the three methods of expense distribution later defined, and the nature and proper use of factory cost reports...Does not attempt to describe any specific cost-keeping system...Mature minds...will find in it suggestion, explanation, and direction obtainable so far as the reviewer knows, nowhere else." *Charles Buxton Going*.

**Clapham, Charles B.**

Arithmetic for engineers. 436 p. Dutton, \$3 net.

*Engineering record*, March 24, 1917, p.475. ⅓ col.

"Comprehensive, practical treatment of the most elementary parts of mathematics, including simple algebra, mensuration, logarithms, graphs and the slide rule...Written for students of most limited training."

*Scientific American*, April 7, 1917, p.364. ⅓ col.

"Admirably combining the theoretical and the practical, the work aims also at economy of effort...The clear detail of the work should commend it wherever a text for home study is desired."

**Clements, Frederick E.**

Plant succession; an analysis of the development of vegetation. 512 p. 1916. Carnegie Institution of Washington. (Carnegie Institution of Washington. Publication no.242.)

*Science*, April 6, 1917, p.339. 5 col.

"The bibliography of nearly a thousand titles...is still another valuable part of the book...It may be said...that Clements's monograph presents an invaluable summary of our knowledge of plant succession and that it must become at once the indispensable reference and guide for the students of vegetative cycles in all parts of the world."  
*Raymond J. Pool.*

**Clewell, C. E.**

Handbook of machine shop electricity. 462 p. McGraw, \$3.

*Electrical world*, March 24, 1917, p.571. ¾ col.

"Author...has compiled from many sources including the latest handbooks, a great deal of practical data and information on the selection, installation, and operation of the electrical equipment that is required in a machine shop...Section on costs is a valuable feature."

**Clowe, Frank, & Coleman, J. B.**

Elementary practical chemistry. pt.2: Analytical chemistry, qualitative and quantitative. Ed.8. 1916. Churchill, 3s. 6d. net.

*Analyst*, Feb. 1917, p.65. 1 p.

**Conradi, A. F. & Thomas, W. A.**

Farm spies; how the boys investigated field crop insects. 165 p. 1916. Macmillan, 3s. net.

*Nature*, March 8, 1917, p.23. ½ col.

"Collection of brightly written, well-illustrated 'story-articles' on various common injurious insects of North America, designed to catch the attention and enlist the sympathies of 'boys and girls and those persons who know nothing about insects and how to fight them.'"

**Cook, Arthur L.**

Interior wiring and systems for electric light and power service. 426 p. Wiley, \$2.

*Electrical age*, April 1917, p.56. ¼ col.

"Treatment of lighting is especially good...Principles of illumination are taken up in a clear and concise manner. The thirty-three pages on calculation of illumination are eminently suited for the busy architect and contractor...The characteristics and advantages of various types of motors are given. Control devices are well treated...The chapter on selection of motors is good...Interior wiring forms the last section...A very useful feature is the chapter on examples of actual wiring systems."

*Electrical record*, April 1917, p.90. ½ col.

"Author...is head of the department of Applied Electricity at Pratt Institute, Brooklyn, N. Y., and formerly electric power engineer of the Westinghouse, Church, Kerr & Company...This book should be found of everyday use by practical men who desire condensed and useful information and data on light and power wiring."

**Cooper, W. R.**

Primary batteries; their theory, construction and use. New & enl. ed. 458 p. Electrician, 12s. 6d.

*Electrical world*, March 24, 1917, p.571. ½ col.

"A very practical textbook which first made its appearance in 1901, and which has received much new material since that date...It is so seldom...that we find selenium cells suitably treated in electrical literature that we owe the author thanks for nearly having trespassed beyond his own limitations."

**Cowee, G. A.**

Practical safety methods and devices; manufacturing and engineering. Routledge, 12s. 6d. net.

*Engineer*, March 23, 1917, p.265. ½ col.

"Object is to secure an increase of efficiency in the workshop and factory by the

**Cowee, G. A.—continued.**

introduction of certain safeguards, material and otherwise, which have been found to be effective against accidents. These safeguards are fully described and, where they can be, illustrated. The book no doubt will prove of considerable interest and value to British readers, although its author, its style, and its subject are characteristically American."

**Crawford, J. G. ed.**

Fuel Association proceedings. 355 p. International Railway Fuel Association, paper \$.50; leather \$1.

*Railway mechanical engineer*, April 1917, p.175.

**Cullimore, Allan R.**

Use of the slide rule. 36 p. Keuffel & Esser, \$.50.

*American machinist*, March 29, 1917, p.572. 11 l.

"A refreshing variation from the usual manual for the slide rule...A considerable number of problems, with their answers, are given."

**Cumming, A. C. & Kay, S. A.**

Textbook of quantitative chemical analysis. Ed.2. 1916. Gurney, 9s. net.

*Analyst*, March 1917, p.112. 17½ p.

"Intended primarily for university and college students'...Whilst the book contains much matter obviously intended for the absolute beginner, it deals with the analysis of ores and alloys, the complete analysis of superphosphate manure, technical gas analysis, water analysis, quantitative organic analysis, and the determination of molecular weights...Excellent features...are the sections devoted to elementary electrolytic processes." *A. Chaston Chapman*.

**Curtis, Thomas Stanley.**

High frequency apparatus; its construction and practical application. 247 p. Everyday Mechanics Co., \$2.

*American machinist*, March 22, 1917, p.528. 10 l.

"Useful and practical book for amateurs who wish to familiarize themselves with the subject and experiment with high-frequency apparatus."

*Electrical age*, April 1917, p.56. ½ col.

"As an account of what high frequency currents are, how they are produced, and what they will do, the book is perfectly suited to the large number of home and school experimenters who are interested in this most spectacular of electrical application. There is practically no 'theory' in the book, but a great deal of practical information as to the construction of apparatus."

*Telephony*, April 7, 1917, p.46. ½ col.

"For those interested in high frequency apparatus the book presents some interesting information and data."

**Dales, Benton, & Barneby, O. L.**

Elementary qualitative analysis. 205 p. 1916. Wiley, 5s. 6d. net.

*Chemical news*, March 2, 1917, p.107. ½ col.

"Presents some useful features, while showing no marked novelty or originality."

**Daugherty, R. L.**

Hydraulics. McGraw, 10s. 6d.

*Engineering*, March 2, 1917, p.209. 1½ col.

"Of an elementary character covering general fundamental principles rather than attempting the detailed or special treatment of hydraulic machinery."

**Delbet, Pierre, and others.**

Méthode de traitement des fractures. 501 p. 1916. Alcan, Paris, 20 fr. (No.5 des Annales de la clinique chirurgicale du Professeur Pierre Delbet.)

*Revue générale des sciences pures et appliquées*, Feb. 15, 1917, p.91. 1 col.



**De Lee, Joseph B. & Stowe, H. M. ed.**

Obstetrics. 1916. Year Book Pub. Co., \$1.35. (Practical medicine series, v.7.)

*St. Paul medical journal*, March 1917, p.100. ½ col.

"May be read with much profit... Abstracts from the literature of the year's work in obstetrics." *F. E. Leavitt.*

**Doubleday, Arthur W.**

Photographs of crystallizable chemical salts. 1916. Research Pub. Co., \$6.

*Journal of the American Chemical Society*, April 1917, p.839. ¼ p.

"There are fifty-seven plates containing one hundred and fourteen large photographs... Taken as a whole... the book may prove useful to the microscopist in the field for which it was planned." *E. W. Rockwood.*

**Droege, John A.**

Passenger terminals and trains. 410 p. 1916. McGraw.

*Journal of the Western Society of Engineers*, Feb. 1917, p.124. ½ p.

"Companion volume to the author's well-known work on freight terminals, and is worthy of a place with it in the railroad engineer's library."

**Dunham, Elizabeth Marie.**

How to know the mosses. 287 p. 1916. Houghton, \$1.25.

*Science*, April 13, 1917, p.363. ¾ col.

"Intended as 'a popular guide to the mosses of the Northeastern United States'... The drawings in the text and the full-page illustrations will be found helpful." *E. G. Britton.*

**Durand, W. F.**

Practical marine engineering. Ed.4, rev. & enl. by C. W. Dyson. 982 p. 1917. Marine Engineering, \$6.

*International marine engineering*, April 1917, p.190. 1¼ col.

"The first edition... was written by Professor W. F. Durand... Much new material has been added in order to bring the book thoroughly up to date... The treatment of the subject throughout has been with a view to simplicity."

**Durham, H. W.**

Saws; their care and treatment. 272 p. Wm. Rider & Son, 5s. net.

*Ironmonger*, March 24, 1917, p.186. ½ col.

"Mr. Durham has not lived to see the results of his long experience among saw users collated and arranged for their reference and benefit. He has left, however, a text-book which it is safe to predict will find a place in the office of many sawmills and joinery works. Except for the smallest of hand and tenon saws there is scarcely a type of saw that is not illustrated and explained, and of which the best methods for sharpening and setting are not given."

**E. Q. and E. weekly wages tables.** Germania Pub. Co., Milwaukee, \$5.

*Printing art*, April 1917, p.145. ¼ col.

"A set of tables printed on one side of a strong ledger paper and held in a loose leaf binder... It is arranged on the weekly eight-hour plan and forms an easy method for computing pay rolls and labor costs... Price of the complete set of forty tables is \$5.00, or any twenty tables can be supplied for \$3.75."

**Eliason, Eldridge L.**

First aid in emergencies. Lippincott, \$1.50.

*American journal of nursing*, April 1917, p.666. ½ p.

"Written with special thought for the 'laity—firemen, police, life guards, sailors, Boy Scouts, explorers, factory workers, etc.'... Directions for meeting all sorts of possible emergencies are given and profuse illustrations help to impress the instructions on the mind... Would materially assist those who are studying to help in case of possible war."

**Evans, A. H.**

Birds of Britain; their distribution and habits. 275 p. 1916. Putnam's, \$1.25.

*Auk*, April 1917, p.223. ½ p.

"This little work' we are told in the preface 'though primarily intended for schools, may be found useful by those who require a short hand-book which includes the results of the most recent observations'... The book will however prove of much value in spreading a knowledge of the British avifauna, which after all is its chief object." *W. S.*

*Ibis*, Jan. 1917, p.96. 1 p.

"Intended primarily for the use of schools, though it will doubtless be found useful by other people who require a short and concise hand-book... We feel that it would have been more useful if more space had been given to clearly pointing out the diagnostic characters of the families and genera."

**Fernald [Robert Heywood], & Orrok [G. A.].**

Engineering of power plants. 586 p. McGraw, \$4.

*National engineer*, April 1917, p.149. 1½ col.

"Is a happy medium of practice and theory that has been greatly lacking in books of this nature... Does not cover details of design or operation of the different parts of power plant equipment... but considers the power plant as a whole from the standpoint of economical power production."

**[Ferris, Charles E.]**

Manual for engineers. Author, Knoxville, Tenn., \$50.

*National engineer*, April 1917, p.150. ¼ col.

"Compilation of the more commonly used mathematical and engineering tables, in connection with a number of other valuable and useful data often required in engineering calculations."

**Ferris, Charles E. comp.**

Tables and other data for engineers and business men. Ed.20. 220 p. Author, Knoxville, Tenn.

*American journal of science*, April 1917, p.342. ½ p.

"New edition of a useful little pocket-book which many have been glad to avail themselves of in the past."

**Fisher, Irving, & Fisk, E. L.**

How to live. Ed.3. 345 p. 1916. Funk, \$1.

*Journal of home economics*, April 1917, p.190. 1½ col.

"Probably there will be no single exception to general popular interest in the purpose of this book. The authors state this purpose as follows: To spread knowledge of individual hygiene—to extend human life, not only as to length, but also, if we may so express it, as to breadth and depth." *Winifred Stuart Gibbs.*

**Flint, Austin.**

Manual of physical diagnosis. Ed.7. 1917. Lea, \$2.50.

*Pennsylvania medical journal*, March 1917, p.451. ½ col.

"To fill... the demand of the student and of many graduates in medicine, for simplicity, directness, exactness and skill in dealing with physical signs in health and diseases."

**France—Bureau des longitudes.**

Annuaire pour l'an 1917. 700 p. 1917. Gauthier-Villars, Paris, 2 fr.

*Journal of the Franklin Institute*, April 1917, p.524. ¼ col.

"This well-known annual contains... the usual astronomical, meteorologic, and metrologic data, with three special essays of much interest: The Babylonian Calendar, by G. Bigourdan; The Advance of Legal Time during the Summer of 1916 (Daylight-saving), by J. Renaud, and The Valuation of the Meter in Terms of Wave-lengths of Light, by M. Hamy."

**Gardner, Mary Sewall.**

Public health nursing. 364 p. 1916. Macmillan, \$1.75.

*American journal of nursing*, April 1917, p.666. ½ p.

**Gardner, Mary Sewall—continued.**

"No branch of the work has been overlooked and the detail as treated by the author makes excellent reading... Should be available to every student nurse."

*American journal of public health*, March 1917, p.331. 1½ col.

"The author has presented a masterly concept of the sphere of the nurse in health organization... To the health official and the nurse, seeking the best in health achievement, as well as to the layman... Miss Gardner's book is unhesitatingly recommended."  
C. E. Terry.

**Gear, Harry Barnes, & Williams, P. F.**

Electric central station distribution systems; their design and construction. Ed.2, rev. 458 p. Van Nostrand, \$3.50.

*Electrical world*, March 31, 1917, p.619. ½ col.

**Geikie, Archibald.**

Birds of Shakespeare. 120 p. 1916. MacLehose.

*Ibis*, Jan. 1917, p.97. 1½ p.

"The author has done little more than string together a limited number of quotations from the plays of Shakespeare, leaving his readers to draw their own conclusions."

**Gilbreth, Frank B. & Gilbreth, L. M.**

Fatigue study; the elimination of humanity's greatest unnecessary waste; a first step in motion study. 159 p. 1916. Routledge, 6s. net.

*Nature*, March 8, 1917, p.23. ½ col.

**Goddard, Richard E.**

General cargo. 199 p. 1916. Constable, 4s. 6d. net.

*Chemical news*, March 9, 1917, p.119. ½ col.

"Author of this introduction to salesmanship has had business relations with commercial men of most of the civilized countries of the world, and has made a study of the psychology of the nations... He gives brief accounts of his views relating to the manners, customs, and requirements of the inhabitants of the chief countries of the world, and his judgments appear to be shrewd and his comments to the point."

**Goodie, William J.**

Steam turbines; a text-book for engineering students. 519 p. Longmans, 12s. 6d. net.

*Mechanical engineer*, March 2, 1917, p.170. ½ col.

"The book is a real good one, and we have pleasure in commending it to all interested in the construction of steam turbines."

**Goursat, E.**

Functions of a complex variable, v.2, pt.1; tr. by E. R. Hedrick & O. Dunkel. 259 p. 1916. Ginn, 11s. 6d.

*Nature*, March 22, 1917, p.61. ¾ col.

"Altogether we could not wish for a better handbook for students of function-theory; it is clear, compact, and consistent; the references are to first-rate authorities, and sufficient to introduce the reader to the original sources."

**Granjon, R. & Rosemberg, P.**

Autogenous welding; tr. by D. Richardson. [Ed.4.] 240 p. Griffin, 5s. net.

*Ironmonger*, March 24, 1917, p.186. ¼ col.

"Mr. Richardson is a lucky man to have to prepare a new edition of a highly technical book every year. The present is the fourth, and it is better than the third... The text has been revised, and some additional matter based on recent French work has been incorporated... There are also new illustrations and notes in the aluminium section and descriptions of a number of welding machines not included in editions one to three."



**Green, Carl.**

Wharves and piers; their design, construction and equipment. 248 p. 1917. McGraw, \$3.

*Journal of the Western Society of Engineers*, Feb. 1917, p.122. 1½ p.

"The subject of pile-driving has not been treated at length in this book...but the general question of design, construction and equipment, including machinery for handling miscellaneous package freight, has been systematically treated."

**Grierson, R.**

Some modern methods of ventilation. 188 p. Constable, 8s. 6d.

*Ironmonger*, March 24, 1917, p.186. ¼ col.

"The author of this contribution to a literature which is admittedly scanty has not attempted an exhaustive theoretical treatise. He has collected much scattered information which he has sifted with a good deal of skill bred of intimate knowledge of the practical side of his subject. Moreover the plant, instruments and methods of which he treats are up-to-date and fairly comprehensive, so that the result is a satisfactory and useful statement of things as they are."

**Griffith, Ira S.**

Carpentry. 188 p. Manual Arts Press, \$1.

*Building age*, April 1917, p.221. 1 col.

"An important addition to the literature upon elementary carpentry...The author is an experienced carpenter and contractor, and is chairman of the Manual Arts Department of the University of Missouri."

*Furniture manufacturer and artisan*, March 1917, p.139. ¼ col.

"A textbook for use by trade apprentices, students in vocational and trade schools, and students of manual arts. It is a clear treatise on the every-day problems of the carpenter and house builder. As a textbook on carpentry, it meets every requirement of the student. No other publication has ever undertaken to cover the essentials of house building in a manner adapted for school use as this book on 'Carpentry.'"

**Griffith, Ira S.**

Roof framing tables. Manual Arts Press, \$1.25.

*Building age*, April 1917, p.221. 7 l.

"For use in roof framing either by means of the steel square or protractor and... accompanied by a booklet giving directions for their proper use...Tables are of celluloid and are contained in a case."

**Griffith, Ira S.**

Woodwork for secondary schools. 370 p. Manual Arts Press, \$1.75.

*Furniture manufacturer and artisan*, March 1917, p.138. ¼ col.

"Text book for high schools, colleges, vocational schools and industrial schools... Valuable as a textbook...Equally valuable as a reference book for teachers of wood-working."

**Grunsky, Carl Ewald, & Grunsky, C. E. jr.**

Valuation, depreciation and the rate-base. 387 p. Wiley, \$4 net.

*American gas engineering journal*, March 24, 1917, p.302. ¾ col.

"An original analysis of the problem cited, special consideration being given to a discussion of the non-agreement of the actual life of articles which have a limited period of usefulness with their probable or normal life."

*Electric railway journal*, April 7, 1917, p.674. ¼ col.

"An amplification of the fundamental idea that there would be great advantage in adopting, instead of 'present value' a rate basis without deduction of depreciation, which would include but little, if anything, other than 'legitimate and properly-estimated cost' as the starting point in fixing rates...The engineer or utility official...will probably find the mathematical and tabular information of considerable value."

*Engineering record*, March 24, 1917, p.475. 1½ col.

"Its appeal to engineers will...be...in the extended discussion of depreciation and its effect on the rate base and in the elaborate tables that occupy nearly a third of the book." C. W. Stark.

*Railway review*, April 14, 1917, p.539. ½ col.

"A studious presentation of one working theory."

**Hadamard, J.**

Four lectures on mathematics. 53 p. Columbia University Press, \$1.75.

*Electrician*, March 23, 1917, p.745. ½ p.

"'Saturday Morning Lectures' delivered by Prof. Hadamard, of the College de France and the Ecole Polytechnique, in the autumn of 1911 at Columbia University were taken down by Dr. A. N. Goldsmith and after revision by the author are now published. They are in every respect admirable."

**Hager, Dorsey.**

Practical oil geology. Ed.2. 187 p. 1916. McGraw, \$2 net.

*Canadian engineer*, March 29, 1917, p.279. ½ col.

"The dedication is, 'To the Practical Oil Man of America, with the hope that the book will bring him to a better understanding of the relation of the Geologist to the Petroleum Industry'...In addition it will serve as a textbook for young oil geologists, and it will assist in the formation of intelligent public opinion...Is of convenient size to be carried in the pocket." *J. B. Tyrrell.*

**Harding, L. A. & Willard, A. C.**

Mechanical equipment of buildings. v.1: Heating and ventilation. 615 p. Wiley, \$4.

*Building age*, April 1917, p.221. ¼ col.

"Very comprehensive...Object of the authors was to produce a reference book for architects and engineers which should contain sufficient theoretical and commercial data for practical use in designing and at the same time serve to show the student the relation between the theoretical principles involved and their application to actual problems."

**Hausbrand, E.**

Evaporating, condensing and cooling apparatus; tr. by A. C. Wright. 401 p. Scott, Greenwood, 12s. 6d. net.

*Ironmonger*, March 24, 1917, p.186. ¼ col.

"Pre-eminently a book of reference, containing as it does nearly eighty tables, many of them of considerable range and comprehensiveness...There are in addition numerous examples of problems which are worked out and explained. In some of these examples details of experiments bearing on the problems are appended."

**Hawk, Philip B.**

Practical physiological chemistry. Ed.5, rev. & enl. 638 p. 1916. Blakiston, \$3.

*Journal of the Franklin Institute*, April 1917, p.522. ¾ p.

"Five new chapters have been inserted in this edition...In all the chapters the analytic methods have been rearranged in sections on principle, procedure, calculation and interpretation. The laboratory procedure in the most important tests and methods is printed in blackface type for convenience of reference. The demand for this book is shown by the fact that during one decade five editions have appeared, and one edition has been reprinted twice." *Joseph S. Hepburn.*

*Philippine journal of science*, July 1916, p.201. 1 p.

"Has been brought up-to-date by thoroughly revising and rewriting the preceding edition and by adding five new chapters...An examination of this latest edition impresses one with the important part given to the discussion of the function of enzymic activity in the everyday life of the human being...Excellent in subject matter and arrangement and is a valuable contribution to this phase of chemical literature." *H. C. B.*

**Hays, Joseph W.**

How to build up furnace efficiency. Ed.10, rev. & enl. 154 p. Author, Chicago, \$1.

*Furniture manufacturer and artisan*, March 1917, p.138. 9 l.

"Valuable for all interested in the problems of combustion."

*Journal of industrial and engineering chemistry*, April 1, 1917, p.422. ½ col.

"The present tenth edition contains many new features...The subject discussed deals principally with the relation of the percentage of carbon dioxide in the flue gas, the draft in the furnace, stack temperature, leaks due to faulty boiler setting and how these affect the conditions for proper combustion." *Oscar W. Palmenberg.*

**Hendrickson, A. V.**

Gas chemists' summary, 1915. 1916. Walter King, 3s. 6d. net.

*Analyst*, Feb. 1917, p.67. 1 p.

"Interesting and full of matter, on the whole well selected, although the author is entirely uncritical in his abstracts." *J. H. Coste*.

**Herbert, T. E.**

Telegraphy. Ed.3, rev. 985 p. Whittaker, 9s. net.

*Science*. March 30, 1917, p.313.

"Designed to meet the needs of the technical student and the requirements of departmental [British Post Office] technical examinations of the staff." *A. E. Kennelly*.

**Holms, A. Campbell.**

Practical ship-building. Ed.3, rev. 2v. Longmans, \$17.50 net.

v.1. Text.

v.2. Plates.

*Marine review*, April 1917, p.126.  $\frac{3}{4}$  col.

"A complete treatise devoted to the structural design and building of modern steel vessels...Third edition...revised...includes consideration of new features of the industry which have been inaugurated since the last edition...Excellentlly arranged for systematic study."

**Holt, Andrew H.**

Manual of field astronomy. 128 p. 1917. Wiley, \$1.25.

*Proceedings of the American Society of Civil Engineers*, March 1917, p.211.  $\frac{1}{2}$  p.

**Hough, Benjamin Olney, comp.**

Export trade directory. Ed.5. 537 p. 1917. American Exporter, \$5.

*American machinist*, March 29, 1917, p.572.  $\frac{1}{2}$  col.

"Indispensable reference book for American manufacturers whose aim is toward intensive cultivation of foreign markets."

*Inland printer*, April 1917, p.104.  $\frac{1}{2}$  col.

"Greatly enlarged...as contrasted with...the last edition. It includes important lists of the various branches connected with the export trade...Will be found of great value by every exporter."

*Machinery*, April 1917, p.748.  $\frac{1}{4}$  col.

"Contains an extension of the lists of foreign trade forwarding agents, including concerns of this character in other cities than New York. Specifications of shipping routes to foreign markets, locations of American consuls abroad and foreign consuls in the United States are also features of value to those interested in developing their foreign trade."

**Hurley, Edward N.**

Awakening of business. 240 p. Doubleday, \$2 net.

*Coal age*, April 7, 1917, p.641.  $1\frac{1}{2}$  col.

"Interesting from cover to cover. Hurley's meaning is always clear and his ideas always clever."

*Furniture manufacturer and artisan*, March 1917, p.138. 1 col.

"The author...states that it is his hope 'that this book may assist business men in bettering conditions and in working out sound methods of co-operation; that it will inform them of government activities in their behalf and bring about a closer harmony between them and government.'"

**Hutt, C. W.**

Crowley's hygiene of school life. Ed.2, rev. 443 p. 1916. Methuen, 3s. 6d. net.

*Journal of the Royal Sanitary Institute*, March 1917, sup. p.1.  $\frac{3}{8}$  p.

"For anyone studying the broader aspects of school hygiene, especially from the administrative point of view, the book is a very useful volume." *A. H. H.*

**Industrial arts index**; ed. by Marion E. Potter and others. 530 p. 1916. H. W. Wilson, \$8.

*Gas age*, April 16, 1917, p.388.  $\frac{1}{4}$  col.

"Fourth annual cumulation of this subject index to a selected list of engineering and trade periodicals for 1916. There are 81 leading technical periodicals listed."



**Jago, William, & Jago, W. C.**

Technology of bread-making. 908 p. Bakers' Helper Co., \$6.50. (American edition.)

*American food journal*, April 1917, p.211.

"The friend, philosopher and guide of every bakeshop chemist. It is as integral a part of the flour mill and bakeshop laboratory as is a fine balance... Although a British book, and for that reason containing one or two chapters which are of no practical interest to the American reader, it is in the main the best book on commercial baking in the English language."

**Jeter, S. F.**

Riveted boiler joints. 450 p. McGraw, \$3.

*American machinist*, March 22, 1917, p.528. ½ col.

"Exhaustive treatise on the design and failures of riveted boiler joints."

**John Fritz medal.** 98 p. John Fritz Medal Board, N. Y., \$4.

*Journal of the American Society of Mechanical Engineers*, April 1917, p.370. 10 l.

"The John Fritz Medal Board of Award, appointed by the four great national engineering societies, has published this handsome volume... giving a history of the medal, the rules governing its award, biographical sketches and portraits of the thirteen medalists."

**Johnson, R. H. & Huntley, L. G.**

Principles of oil and gas production. 371 p. 1916. Wiley, 16s. net.

*Nature*, Feb. 22, 1917, p.487. 2 col.

"Should be of especial usefulness owing to its combination of practical information... and its clear and accurate statements of scientific principles... The most valuable section of the book is the description of the oilfields of North America."

**Johnson's steam vessels of the Atlantic coast, 1917.** 240 p. 1917. Eads Johnson Pub. Co., \$5.

*International marine engineering*, April 1917, p.190. ¼ col.

"Annual publication containing a complete and accurate list of the mercantile steam vessels of American Registry on the Atlantic seaboard, together with the main particulars of each vessel... First is given an alphabetical list of the steamship companies and owners of vessels; then an alphabetical list of each vessel with the owners' name, supplemented by an alphabetical list of former names of vessels listed in the book and, finally, the particulars of all vessels of various fleets arranged alphabetically according to the name of the owner."

*Marine review*, April 1917, p.139. ½ col.

**Johnston, J. E. jr.**

Blast-furnace construction in America. 405 p. McGraw.

*Blast furnace and steel plant*, April 1917, p.190. ¼ col.

"The series of articles on blast furnace construction and operation which appeared in several numbers of 'Metallurgical and Chemical Engineering'... Is a thorough covering of the subject in the compass allowed by the 405 pages utilized."

**Jones, Edward D.**

Administration of industrial enterprises, with special reference to factory practice. 448 p. 1916. Longmans, \$2 net.

*Scientific American*, April 7, 1917, p.364. ½ col.

"The author has added another notable volume to his writings on business and economics."

**Jordan, Edwin O.**

Text-book of general bacteriology. Ed.5, rev. 669 p. 1916. Saunders, \$3.25 net.

*Scientific American*, April 14, 1917, p.386. ¼ col.

"Should appeal to the general scientific student and reader... Not intended to meet the needs of the advanced worker, but is a good general introduction to bacteriology."

**Judge, Arthur W.**

High-speed internal-combustion engines. 350 p. Whittaker, 15s. net.

*Mechanical engineer*, March 2, 1917, p.171.  $\frac{1}{3}$  col.

"Mathematical rather than constructional and practical, and the volume obviously is intended more as an aid to the advanced student and designer than as a guide to the car user."

**Kellerhouse, Lucy C.**

Forest fancies. 164 p. Duffield, \$1.50.

*Forest leaves*, April 1917, p.32.  $\frac{1}{3}$  col.

"Consists of seven chapters, each a complete story in itself...Written in a way which will interest the children in the trees."

**Kelly, A. Ashmun.**

The expert interior decorator. 200 p. Author, \$3.

*Painters magazine and paint and wall paper dealer*, March 1917, p.208.  $\frac{1}{3}$  col.

"The latest in the series of 'Expert' books by the same author...So full of valuable information and practical formulas that it ought to be in every paint shop library."

**Kinney, J. P.**

Essentials of American timber law. 279 p. 1917. Wiley.

*Journal of forestry*, Feb. 1917, p.254.  $1\frac{1}{3}$  p.

"Mr. Kinney is not only a forester (M. F.), but has also the title LL. B., hence is particularly well equipped...No one who even glances through the volume can help being impressed with the thorough and painstaking manner in which the compilation has been done, citation of authorities, and of cases supporting every point made. A very full table of contents and an index facilitates the use of the book." B. E. F.

**Klapper, Paul.**

Teaching of arithmetic. 387 p. 1916. Appleton.

*American journal of science*, April 1917, p.333.  $\frac{1}{3}$  col.

"Not a text on the subject of arithmetic, but...a manual of method of teaching arithmetic...Although the text refers primarily to arithmetic it merits the attention of all teachers of elementary subjects because the underlying principles are of general applicability and since the material is presented in a very clear and thorough manner."

**Lamb, Arthur B.**

Laboratory manual of general chemistry. 160 p. 1916. Harvard University Press, \$1.45.

*Chemical news*, March 9, 1917, p.119.  $\frac{1}{3}$  col.

"Very clear and interesting theoretical discussions are introduced, and full references for 'assigned' and 'suggested' readings are included."

**La Vallée Poussin, C. de.**

Intégrales de Lebesgue; fonctions d'ensemble; classes de Baire. 151 p. 1916. Gauthier-Villars, Paris, 7 fr.

*Nature*, March 22, 1917, p.61. 1 col.

"Although brief, the course is so far self-contained that it ought to be intelligible to a reader who knows little or nothing about the theory of sets or that of transfinite numbers."

**Lunge, George.**

Technical chemists' handbook. Ed.2, rev. 264 p. 1916. Van Nostrand, \$3.50.

*Gas age*, April 16, 1917, p.388.  $\frac{1}{4}$  col.

"Aim...is to establish uniformity among practical chemists, buyers, sellers and analysts in regard to numerical data employed in their work and the analytical methods used for the control of processes and for the testing of the resulting products."

*Journal of the Society of Chemical Industry*, March 15, 1917, p.308.  $\frac{1}{4}$  col.

"In this new edition of Dr. Lunge's well-known handbook, all the analytical factors have been recalculated on the basis of the atomic weights published by the International Committee for 1916, and the tables of specific gravity and other tables have been altered in accordance with the most recent and reliable determinations."

**Lyle, W. T.**

Parks and park engineering. 130 p. 1916. Wiley, 5s. 6d. net.

*Nature*, Feb. 22, 1917, p.486. ½ col.

"Will undoubtedly fill a useful place and serve as an introduction to more specialised works on construction."

**Lyndon, Lamar.**

Hydro-electric power. 2v. 1916. McGraw.

v.1. Hydraulic development and equipment. 499 p. \$5 net.

v.2. Electrical equipment and transmission. 360 p. \$3.50.

*Canadian engineer*, March 29, 1917, p.278. (Review of v.1.) 2½ col.

"This work compares most favorably with the half dozen or so of other American books on the same subject. The engineer engaged in the design of hydraulic plants proper, not including the design of hydraulic machinery, will probably find Mr. Lyndon's book the most useful one yet published in English."

*Electrical world*, April 7, 1917, p.665. ¾ col.

"Vol. I of this work is about the most concise treatment of hydraulic engineering from the standpoint of design and construction that is now available...Vol. II, which deals with electrical equipment of stations and the main features of transmission systems, is considerably more general in its discussions on design than Vol. I...The two volumes form a very good reference text on features of the modern hydroelectric power plant and will probably serve a useful purpose as a practical text-book for schools and colleges."

**McCullum, E. V.**

Text-book of organic chemistry for students of medicine and biology. 426 p. 1916. Macmillan, 10s. net.

*Chemical news*, March 9, 1917, p.119. ⅓ col.

"Well planned, and the author has succeeded in making the subject attractive to the beginner."

**McConnell, James R.**

Flying for France. 157 p. Doubleday, \$1.

*Aviation and aeronautical engineering*, March 1, 1917, p.141. 10 l.

"Vivid and interesting account of the daily work of the American escadrille of the French Flying Corps, particularly over Verdun and on the Somme front."

**MacRobert, T. M.**

Functions of a complex variable. 298 p. 1917. Macmillan, 12s. net.

*Nature*, March 22, 1917, p.61. ½ col.

"A book that is likely to be very useful; it is not too big, the selection of theorems is judicious, and there is a large number of really instructive examples, both worked and unworked."

**McWane, R. C.**

Pipe and the public welfare. 165 p. 1917. Stirling Press, \$1.

*Journal of the American Society of Mechanical Engineers*, April 1917, p.370. 6 l.

"After a brief historical sketch of the use of pipe from the earliest days, the author describes the methods used in manufacturing cast-iron, wrought-iron, and steel pipe. A third chapter gives much technical and historical information on the deterioration of metal pipe and canvasses the relative merits of the wrought and cast forms. The final chapter...is devoted to wood-stave pipe."

**Maddox, Harry A.**

Paper; its history, sources and manufacture. 160 p. Pitman, \$.85.

*Inland printer*, April 1917, p.103. 1 col.

"Written with a view to acquainting the general reader with a full understanding of how raw material is converted into paper...Gives an excellent history of the introduction of the early forms of crude paper from the East, together with matter relating to the making of paper in England and the Continent in early times."

**Marsh, Charles F. & Dunn, William.**

Manual of reinforced concrete. Ed.3. 1916. Constable, 10s. 6d. net.

*Engineer*, March 23, 1917, p.265. ⅓ col.

"Practically a new book, since it has been entirely rewritten and considerably enlarged—actually from 290 to 475 pages...A wonderfully complete collection of data regarding the subject."



**Marshall, Charles E. ed.**

Microbiology; a text-book of microorganisms, general and applied. Ed.2, rev. & enl. 861 p. Blakiston, \$3 net.

*Journal of the Franklin Institute*, April 1917, p.523. ½ p.

"Twenty-five specialists, American and foreign, have assisted Professor Marshall in the preparation of this book, which is packed with a large amount of the most interesting and important information...Although prepared as a text-book, the work is well adapted for perusal by the non-professional." *Henry Leffmann*.

**Martin, Geoffrey.**

Modern chemistry and its wonders. 351 p. Van Nostrand, \$2.

*Journal of industrial and engineering chemistry*, April 1, 1917, p.423. 1¼ col.

"Intended to interest the cultured, general reader in some of the really wonderful achievements of scientific chemistry'...The reviewer felt that the main worth of the book rested with its value to students of chemistry, and more especially the layman of average education...With the layman in view, the book was placed in the hands of a friend who had never studied chemistry...The book was not only read, but was read on until the small hours of the morning." *Arthur C. Neish*.

**Martin, Geoffrey, and others.**

Industrial and manufacturing chemistry; inorganic. v.I. 496 p. Crosby Lockwood, 25s.

*Journal of the Society of Chemical Industry*, March 15, 1917, p.308. ¾ col.

"The present volume, which is similar in style and arrangement to the work dealing with organic chemical industries by the same author, is divided into fifty-one sections, in each of which an industry is dealt with very briefly, with copious references to the literature."

**Mathews, Gregory M.**

Birds of Australia. v.5, pt.3, p.249-352. 1916. Witherby.

*Ibis*, Jan. 1917, p.101. 1½ p.

"Concludes the fifth volume of the work."

**Maudsley, Henry.**

Organic to human; psychological and sociological. 386 p. 1916. Macmillan, 12s. net.

*Nature*, March 8, 1917, p.21. 1¾ col.

"We welcome this vigorous expression of a distinguished veteran's convictions in regard to some of the major problems of evolution, both organic and social."

**Mead, Daniel W.**

Contracts, specifications and engineering relations. 518 p. McGraw, \$3 net.

*Electric railway journal*, April 7, 1917, p.674. ¼ col.

"Intended to familiarize the engineer or architect with some of his relations in practical life. Not only are personal requirements emphasized...but stress is also laid upon the importance of moral and ethical principles."

**Mechanical world electric pocket-book.** 200 p. Emmott King.

*Electrical age*, April 1917, p.56. ½ col.

"This little book supplies the need among practical electrical men for a handy compilation of the essential data of applied electricity...While the practice illustrated is British, yet the book is well suited to the needs of American electrical men who wish to have a concise reference to the points ordinarily met in practice. Pages for a year's diary and memoranda follow the text."

**Mechanical world pocket diary and year book.** Ed.30. 453 p. Norman, Remington, \$35.

*National engineer*, April 1917, p.149. ½ col.

"A collection, mainly of mechanical engineering formulae, tables, rules and data, compiled during a period of thirty years by the Mechanical World and published annually...While adapted particularly to English practice, the greater amount of data are equally applicable to American practice."

**Mechanical world pocket diary and year book—continued.**

*Proceedings of the American Society of Civil Engineers*, March 1917, p.211. 10 l.  
"Thoroughly revised."

*Scientific American*, April 7, 1917, p.364. ¼ col.

"The thirtieth issue of this year book carries the usual notes, rules, tables and data of interest to engineers."

**Merriman, Mansfield, and others, ed.**

American civil engineers' pocket book. Ed.3, enl. 1571 p. 1916.  
Wiley, 21s. net.

*Nature*, Feb. 22, 1917, p.486. ¼ col.

"Has already established an enviable reputation for trustworthiness and completeness, which is well maintained in the third edition."

**Meyer, E. B.**

Underground transmission and distribution for electric light and power. 312 p. McGraw, \$3.

*Electrical world*, March 24, 1917, p.571. ¼ col.

"For the specialist and for central station engineers who are responsible for the installation and maintenance of underground distribution systems, this book will be found of every-day interest and value."

**Mitchell, C. A.**

Vinegar; its manufacture and examination. 201 p. Lippincott, \$2.75.

*Journal of industrial and engineering chemistry*, April 1, 1917, p.423. ¼ col.

"The first third of this volume is devoted to the history of vinegar making, the second to the manufacture of vinegar, and the last to the methods of examination and characteristics of the various kinds of vinegar...Written by an Englishman...and deals mostly with strictly English procedure...Of little value to American readers and is not to be compared with the standard works on vinegar which are available in German and in English." *Ralph H. McKee.*

**Morris, Malcolm.**

The nation's health; the stamping out of venereal disease. 152 p. 1917. Cassell, 3s. 6d. net.

*Journal of the Royal Sanitary Institute*, March 1917, sup. p.1. 1 p.

"A very admirable little book, written by one who is thoroughly conversant with the subject and entitled to speak to the British public as a great authority. It would be well if copies could be seen in every Library in the Kingdom." *L. C. P.*

**Morrison, C. E. & Brodie, O. L.**

Masonry dam design, including high masonry dams. Ed.2, rev. & enl. 276 p. 1916. Wiley, 10s. 6d. net.

*Nature*, Feb. 22, 1917, p.486. ¼ col.

"The most recent methods of calculation and design are very ably treated...In the revision the authors have amplified a number of points which were treated very shortly in the earlier edition."

**Moses, A. J. & Parsons, C. L.**

Elements in mineralogy, crystallography and blow-pipe analysis. Ed.5. 631 p. Van Nostrand, \$3 net.

*Metallurgical and chemical engineering*, April 15, 1917, p.457. ¼ col.

"This well-known and much-used text-book is, in this edition, better than ever... The simplified method of identifying natural crystals by means of axes of symmetry and planes of symmetry is admirable...It is to be hoped that its adoption in Moses' and Parsons' book will assure its universal use."

**Mullen, Charles A.**

Paving economy; road and street. 98 p. Industrial and Educational Press, \$1.

*Good roads*, April 7, 1917, p.222. ¼ col.

"This book, as its title implies, is a treatise on the financial side of road and street work with special reference to pavements...Covers various features of road and street work except the actual details of construction."

**Mulliken, S. P.**

A method for the identification of pure organic compounds. v.2. 327 p. 1916. Wiley, 21s. net.

*Nature*, March 8, 1917, p.21.  $\frac{3}{4}$  col.

"The present arrangement is too mechanical, and makes too little appeal to the previous sequence of chemical events to be entirely satisfactory. At the same time one would not wish to depreciate the value or trustworthiness of the vast and varied data which Dr. Mulliken has compiled with so much care and discrimination."

**Mullins, W. H. & Swann, H. K.**

Bibliography of British ornithology from the earliest times to the end of 1912. pt.2-4. 1916. Macmillan, 6s. net each.

*Auk*, April 1917, p.227.  $\frac{3}{4}$  col.

"Three more parts of this work which was first noticed in 'The Auk' 1916, p.443, have since appeared carrying it well through the letter 'R'...When finally bound up it will form a handsome volume as well as a storehouse of useful information." *W. S.*

**Murray, Athole J.**

Strength of ships. 400 p. Longmans, \$5 net.

*Engineering*, March 2, 1917, p.208.  $2\frac{1}{2}$  col.

"Deals with the mathematical treatment of strength problems as they apply to the completed ship considered as a girder subjected to hogging and sagging, racking and pitching stresses...in a most exhaustive manner...On the whole, the major part of it will be of academic rather than practical interest to the majority of designers."

*Journal of the American Society of Mechanical Engineers*, April 1917, p.370. 11 l.

"In this book, which is said to be the first in the English language to be exclusively devoted to the subject, the author has aimed to include all available information in the field of the strength of materials which has a special application to the design of the structure and fittings of vessels, as well as some of the recently published research work of shipbuilders."

*Marine review*, April 1917, p.147.  $\frac{3}{4}$  col.

"Treated from a practical standpoint...Ship builders will find the section on bulkheads of interest in that a logical method for co-ordinating bulkhead test data is presented."

**Nernst, Walter.**

Theoretical chemistry, from the standpoint of Avogadro's rule and thermodynamics; 4th English ed.; rev. in accordance with 7th German ed., by H. T. Tizard. 853 p. 1916. Macmillan, 15s. net.

*Nature*, March 22, 1917, p.62.  $1\frac{1}{4}$  col.

"Although we give a glad welcome to this new edition of a valuable book, we cannot but feel some regret that certain sections should not have been made rather more modern, and that little or no attention should be given to some recent and valuable contributions to physico-chemical science."

**Netherlands—Commerce department.**

Mededeelingen van den ryksvoorlichtingsdienst ten behoeve van den rubberhandel in de rubbernijverheid te Delft. ser.2. 544 p. 1916. Afdeeling Handel, 's-Gravenhage, 2.50 florins.

*India rubber world*, April 1, 1917, p.400.  $\frac{3}{4}$  col.

"Contains numerous interesting reports of experiments and investigations in various departments of rubber chemistry and manufacture."

**Nobili, Dino.**

Gli strumenti per misure elettriche industriali. 501 p. Rivista Tecnica di Elettricità, Milan, \$2.

*Electrician*, March 23, 1917, p.745.  $\frac{7}{8}$  col.

"A book not often met with in this country, in which an attempt is made to collect in one volume the data and descriptions of the instruments used in making electrical measurements for industrial purposes. Measurements of a purely scientific character are not dealt with, but only those of a technical nature. The more advanced parts are given in much greater detail than the elementary parts, and for this reason the work constitutes a handy book of reference on alternating current working." *S. G. S.*



**O'Dea, E. J.**

Rate extension tables. 200 p. Sherdea Pub. Co., Rutherford, N. J., \$5.

*Railway age gazette*, April 13, 1917, p.772.  $\frac{1}{4}$  col.

"For the quick determination of freight charges, percentages, divisions, wages, etc... Primarily for use in freight houses where circumstances do not demand or permit the use of calculating machines. The author makes free to declare, however, that inasmuch as the book eliminates the chance of error in placing the figures on the calculating machine it may be found of greater use than the latter."

**Ontario—Public highways department.**

General plans for steel highway bridges. The Department.

*Good roads*, April 7, 1917, p.222.  $\frac{1}{4}$  col.

"Comprises 31 plates showing working drawings for steel highway bridges, concrete abutments, and concrete culverts."

**Parkhurst, Frederic A.**

Predetermination of prices. 90 p. Wiley, \$1.25.

*American machinist*, March 29, 1917, p.572.  $\frac{1}{3}$  col.

"Greatest value of the book lies in the arguments brought out in the first chapter on the importance of absolute control of all sources of information...System explained in this book is a definite one for a given type of manufacture, and the forms shown are taken from the practice of two shops only."

**Patterson, Austin M.**

German-English dictionary for chemists. 316 p. 1917. Wiley, \$2 net.

*Journal of industrial and engineering chemistry*, April 1, 1917, p.422.  $\frac{1}{2}$  col.

"Dr. Patterson has performed a public service in the compilation...His extended experience as Editor of Chemical Abstracts has given him exceptional qualifications for such an undertaking and the work shows the same painstaking care which characterized his successful work as Editor...The printing is good, the covers are flexible, and the size is suited to the coat pocket." *Chas. H. Herty*.

**Payne, Arthur F.**

Art metal work. Manual Arts Press.

*Furniture manufacturer and artisan*, March 1917, p.138. 51.

"Covers this subject as applied in manual training courses...We believe that all metal requirements have been met in a very happy combination, and proportion in this book."

**Perrin, Jean.**

Atoms; authorized translation by D. Ll. Hammick. 211 p. 1916. Constable, 6s. net.

*Chemical news*, Feb. 23, 1917, p.96.  $\frac{1}{2}$  col.

"There could be no better exponent of our present-day knowledge of the atom and molecule than Prof. Perrin, whose work 'Les Atomes' has won world-wide recognition as the best and most authoritative short treatise on the subject. The book is a translation of the fourth edition of his work."

**Petrunkevitch, A.**

Morphology of invertebrate types. 263 p. 1916. Macmillan, 6s. net.

*Nature*, March 22, 1917, p.63.  $\frac{1}{2}$  col.

"The descriptions are accurate, and on the whole well done, though some parts are too short."

**Pidduck, F. B.**

Treatise on electricity. Cambridge University Press, 14s. net.

*Engineering*, March 9, 1917, p.232.  $2\frac{1}{2}$  col.

"Addressed to those who bring some previous knowledge to bear upon the subject and have had experience in the laboratory...The author's work, though not historical, yet, by exhibiting the theory in sustained order, corrects the perspective, and affords a surer estimate of the value of the successive steps by which electricity has acquired its importance in physical theory as in mechanical application."

**Plomer, Henry R.**

Short history of English printing. Dutton, \$1.25 net.

*Inland printer*, April 1917, p.103. ¼ col.

"Much of the development of the art of printing has been accomplished under English influences, and a study of the history of English printing...and work of such men as Caxton...Wynken de Worde, Thomas Berthelet, John Day...and other men made famous...in later years, is instructive and absorbing...It is replete in detail of the growth of the art from the year 1476 to 1900."

**Ramsey, Walter Reeve.**

Care and feeding of infants and children; a text-book for trained nurses. Lippincott, \$2 net.

*St. Paul medical journal*, March 1917, p.100. 6 l.

"Every phase of this all important subject is presented so clearly, concisely, and, best of all, with such absolute lack of unnecessary and confusing detail, that this book will prove an invaluable addition to any library. The illustrations are particularly well arranged and helpful." *Margaret M. Fortune.*

**Recknagel, A. B.**

Forest working plans. Ed.2. 265 p. Wiley, \$2.

*Forest leaves*, April 1917, p.32. ¾ p.

"It has been revised, improved, and some excellent features added...The data which Prof. Recknagel has collected in the course of a year's study abroad, and ten years' experience in the United States is fully set forth. The theoretical part has been reduced to a minimum. The aim has been to compile a text-book of value, not only to the student, but also to the practising forester."

**Reid, George.**

Practical sanitation. Ed.18, rev. 356 p. Griffin, 6s.

*Canadian engineer*, March 29, 1917, p.279. 1 col.

"Written more particularly for the use of inspectors and those connected with sanitary inspection in Great Britain. The context deals with sanitation generally as it is considered in temperate climes...When treating with infection and disinfection and food, Dr. Reid presents facts which are useful in all parts of the world." *R. O. Wynne-Roberts.*

*Ironmonger*, March 24, 1917, p.186. ½ col.

"The succeeding editions—the present is the eighteenth—were revised and brought into line with modern ideas and later legislation, but Dr. Reid never discarded certain original characteristics which established its reputation. The work has become a standard of reference and his name is a synonym for the subject with which it deals."

**Reinhardt, Charles W.**

Lettering for draftsmen, engineers and students. Ed.14, rev. & enl. 54 p. Van Nostrand, \$1 net.

*Machinery*, April 1917, p.748. 13 l.

"New edition contains the analyzed Greek alphabet, showing various methods of laying out and constructing titles...Is one that we heartily recommend to all draftsmen needing knowledge of better styles in lettering...It treats of inclined lettering, upright lettering, free-hand alphabets, including the Greek alphabet...lettering for photo-reproduction, etc."

**Ries, Heinrich.**

Economic geology. Ed.4. 876 p. 1916. Wiley, \$4 net.

*Canadian engineer*, March 29, 1917, p.277. 2 col.

"We...welcome the fourth edition of Dr. Ries' excellent volume on economic geology of the United States and Canada...Will be of great interest to all who are anxious to acquire a good knowledge of the useful minerals and ores of the northern portion of this continent...Is furnished with an index of 28 pages, in which almost everything referred to in the book can be found." *J. B. Tyrrell.*

**Roberts, Jay G.**

Manual of bacteriology. Ed.2, rev. Saunders, \$1.50.

*American journal of nursing*, April 1917, p.667. 7 l.

"It is claimed (though not by the author) that 'this new work contains everything the nurse needs to know on these subjects'...Written as the result of a series of lec-

**Roberts, Jay G.—continued.**

tures given to nurses. . . Unnecessary detail has been omitted, but it is a readable book, and one easily to be remembered."

**Rogers, Allen.**

Elements of industrial chemistry. 495 p. Van Nostrand, \$3 net.

*Coal age*, April 7, 1917, p.641. ½ col.

"Abridgment of. . . 'Manual of Industrial Chemistry' . . . Of value chiefly to those who have not affiliated themselves with any particular industry and who want a generalized view of the whole field."

**Roray, Nelson L.**

Industrial arithmetic. 153 p. Blakiston, \$.75.

*American machinist*, March 29, 1917, p.572. ⅓ col.

"Offers a very considerable proportion of entirely abstract problems, which in no way have any visible contact with industry. . . Outside the actual selection of problems, the presentation is clear and logical and the subjects are treated in a way to make the learner's path as easy as is for his good."

**Rose, Mary Swartz.**

Feeding the family. 450 p. 1916. Macmillan, \$2.10.

*Journal of home economics*, April 1917, p.189. 1½ col.

"A valuable and highly successful endeavor to render into popular language and into practical precept present day knowledge of the science of nutrition. . . Knowledge of food values is now available as never before." *Graham Lusk*.

**Royal Society [of London].**

Food supply of the United Kingdom; a report drawn up by a committee of the Royal Society at the request of the president of the Board of Trade. H. M. Stationery Office, 4d.

*Journal of the Society of Chemical Industry*, March 15, 1917, p.308. 2 p.

"First part. . . deals with the food supply of this country in the period before the war. . . In Part II. . . the food supply during 1916 is considered. . . Part III. . . deals with certain suggestions as to possible means for increasing or economising our available food supply. . . Note. . . It is now compulsory on all millers to extract from wheat not less than 81% of flour."

**Russell, Walter M.**

Operation of gas works. 209 p. McGraw, \$2 net.

*American gas engineering journal*, March 24, 1917, p.302. ½ col.

"Intended to supply the needs of the foreman, superintendent, engineer and cadet who is connected with a small or medium-sized gas works, and who desires to increase and widen his knowledge of the principles and practice of gas making."

*Power*, March 20, 1917, p.400. ¼ col.

**Sales Service Company.**

Selling your services. 176 p. Sales Service Co., \$1 net.

*Engineering record*, March 24, 1917, p.476. 6 l.

"Not a wonder-working book which will enable a person without qualifications to get a big job. It does tell, however, in a very practical way how one can get a hearing and best present his merits in connection with vacancies which he is fitted to fill. . . Well worth the reading of anyone seeking a position."

**Sayre, Lucius E.**

Organic materia medica and pharmacognosy. Ed.4, rev. 606 p. Blakiston, \$4.50 net.

*Journal of the American Pharmaceutical Association*, April 1917, p.431. 1½ col.

"Contains many improvements over the previous editions. . . On the whole, the text seems to be quite free from errors and this revision no doubt will maintain the high standard as a materia medica text-book held by its predecessors." *E. N. Gathercoal*.



**Schneider, E. E.**

Commercial woods of the Philippines; their preparation and uses. 246 p. Philippine Bureau of Forestry, \$1. (Bulletin 14.)

*Furniture manufacturer and artisan*, March 1917, p.138. ½ col.

"By far the most comprehensive work on the subject so far published, and also, from the point of view of the wood-user, the most practical."

**Scientists' reference book and diary, 1917.** 134 p. Woolley, 2s. 6d.

*Analyst*, March 1917, p.114. ⅓ col.

"Comprises tables, data and constants, dealing with nearly 300 distinct subjects... As a handy little work of reference, it will be found to contain much that is often sought in vain in much larger volumes... A diary and reference library combined in one small cover." *H. F. E. Hulton*.

*Pharmaceutical journal and pharmacist*, Feb. 24, 1917, p.160. ½ col.

"Full of tables and data which convey information of value to scientific people on a multitude of subjects."

**Scott, R. J. E.**

Hughes' practice of medicine. Ed.11, rev. & enl. 1917. Blakiston, \$3 net.

*Pennsylvania medical journal*, March 1917, p.451. ¼ col.

"Sections on treatment are more complete, and the prescriptions more numerous, probably, than in any other work limited to 800 pages. New and rewritten articles bring the work up to date." *L. F. P.*

**Scovell, Clinton H.**

Cost accounting and burden application. 328 p. 1916. Appleton, \$2 net.

*Journal of the American Society of Mechanical Engineers*, April 1917, p.369. 1¼ col.

"Author... is a specialist in industrial accounting. He is of the modern school... The book is not a systematic treatise, suitable for students, but is a logical discussion of general principles... It should be read by practical accountants who wish to be informed as to the latest and best theory of their profession." *William Kent*.

**Seabrook, Edwin L.**

How to make the business pay, with special reference to the sheet metal business. 175 p. 1916. Sheet Metal Co., \$2.

*Boiler maker*, April 1917, p.106. ½ col.

"Although the information given here does not apply directly to boiler making, nevertheless an understanding of the methods explained would be of great help to a boiler manufacturer or sheet metal worker."

*Scientific American*, April 7, 1917, p.364. ⅓ col.

"Places contractors in touch with vital facts, suggests new avenues of development, and solves many of the common problems of everyday experience."

**Sennett, Richard, & Oram, H. J.**

Marine steam engine. Ed.13. 502 p. 1916. Longmans, \$6 net.

*Journal of the American Society of Mechanical Engineers*, April 1917, p.370. 5 l.

"Much matter has been added to the chapters dealing with the steam turbine, the torsion meter, and the internal-combustion engine, to take account of their rapid development and increasing importance in marine engineering."

**Shattuck, George Cheever.**

Principles of medical treatment. Ed.3, rev. & enl. 1916. Leonard, \$1.50.

*St. Paul medical journal*, March 1917, p.100. 10 l.

"Can be recommended to any one practising medicine... Represents an attempt to offer clearly and concisely sound principles of treatment based on known pathology." *H. T. Nippert*.

**Shaw, Arch Wilkinson.**

Approach to business problems. 333 p. Harvard University Press, \$2.

*American industries*, April 1917, p.41. 7/8 col.

"Business problems are here discussed from the business man's standpoint, with just enough detachment to give an added interest to Mr. Shaw's point of view. Throughout his discussion, which is always clear and stimulating, the author adopts the strategic position recommended to the general manager—a position over-looking all departments of business but free from the bias or prejudice of any one part."

**Sheffield, Herman B.**

The backward baby; treatise on idiocy and the allied mental deficiencies in infancy and early childhood. Rebman, \$1.

*American journal of nursing*, March 1917, p.565. 1/2 p.

"He states that attention has formerly been given to children of school age, and he is convinced that knowledge of the child's condition should be obtained and all possible amelioration by treatment be begun much earlier... He finds... the causes of lack of mental or physical development... due to heredity are less numerous than is usually supposed, as nature has the tendency to eliminate defects if given any chance."

**Sherman, P. Tecumseh.**

Criticism of a tentative draft of an act for health insurance. Author, New York, \$50.

*American industries*, April 1917, p.40. 3/4 col.

"He frankly doubts the wisdom of adopting the compulsory principle in our democracy... Should be in the hands of everyone interested in the project of sickness insurance. It is brief, clear and scholarly and reflects the mind of one sturdily determined to serve [save?] his country (as his father did) from grave errors."

**Siepert, Alfred F.**

Bird houses. Manual Arts Press, \$50.

*Furniture manufacturer and artisan*, March 1917, p.138. 1/4 col.

"Will be of especial interest in elementary manual training."

**Skinner, Walter R.**

Mining manual and mining year book, 1917. 950 p. \$6.

*Mining and scientific press*, April 7, 1917, p.496. 1/4 col.

"While published for the use of the public in London, it is invaluable as a book of reference to many outside Great Britain... Besides the record and description of the various mining companies, the 950 pages furnish statistical data, a glossary of mining terms and a directory of directors, secretaries, and engineers engaged in mining."

**Slocum, S. E.**

Elements of hydraulics. Ed.2. 329 p. 1917. McGraw.

*Journal of the Western Society of Engineers*, Feb. 1917, p.122. 1/2 p.

"In the present edition, the author has... added to the text a more complete and up-to-date discussion of the flow of water in pipes, with special reference to the exponential formula and its graphical solution."

**Smith, Charles M.**

Electric and magnetic measurements. 373 p. 1917. Macmillan, \$2.40.

*Journal of the American Society of Mechanical Engineers*, April 1917, p.370. 61.

"This course, which has been developed from the author's lecture and laboratory notes, presupposes on the part of the student a year's study of general physics and some knowledge of the calculus."

**Spencer, Guilford L.**

Handbook for cane-sugar manufacturers and their chemists. Ed.5. 529 p. 1916. Wiley, \$3.50 net.

*Analyst*, Feb. 1917, p.66. 1 1/2 p.

"Dr. Spencer has considerably increased the value of his well known handbook by amplification of matter and by bringing the subjects dealt with up to date... Dr. Spencer

**Spencer, Guilford L.—continued.**

has compressed an enormous amount of valuable information within the confines of his book." *Frederic I. Scard.*

*Chemical news*, Feb. 23, 1917, p.96. ¼ col.

"Much fuller than the earlier editions...Many of the tables...are new...A very useful addition to the library of the sugar chemist."

**Spencer, Leonard J.**

The world's minerals. 338 p. 1916. Stokes, \$2.75 net.

*Scientific American*, April 7, 1917, p.364. ¼ col.

"The new edition of this authoritative work...brought up to date by the inclusion of newly-discovered elements and their alloys, will be received with enthusiasm."

**Sprague, Ernest H.**

Elementary mathematics for engineers. 244 p. Scott, Greenwood.

*American machinist*, March 29, 1917, p.572. ¼ col.

"Purpose of this book...is to enable a man who desires to acquaint himself with mathematics as used in engineering work to do so without wading through the customary textbooks...Is not elementary enough so that it can be picked up and mastered by anyone without some acquaintance with mathematics."

*National engineer*, April 1917, p.149. ¼ col.

"Aim...has been to cover a wide field in a small compass, to bring out those parts that are essential, and to introduce useful matter as a means of illustrating principles. To make any use of the book, one must have a fair knowledge of arithmetic and the elements of algebra, up to and including the solution of simple equations...Primarily arranged for home study."

**Stillman, Thomas B.**

Engineering chemistry. Ed.5. 743 p. 1916. Chemical, \$5.

*Journal of industrial and engineering chemistry*, April 1, 1917, p.422. ¾ col.

"The book deals with only a restricted field of analytical chemistry, confining itself practically to the testing of such materials as are used in civil or municipal engineering. It does not deal with mineral analysis or organic analysis in general, nor does it deal with the analysis of the important products of chemical industry, such as acids, alkalies, salts, bleaching materials, dyes, medicinal products, etc. However the book presents much that is useful in its particular field." *H. L. Wells.*

**Talbot, F. A.**

Submarines; their mechanism and operation. 274 p. 1915. Lippincott, \$1.25 net.

*International marine engineering*, April 1917, p.190. ¼ col.

"Essentially for the general reader...Describes particularly the Lake and Holland types of submarines...Clearly written...and apparently based upon an accurate knowledge of the subject."

**Taylor, Frederick W. & Thompson, S. E.**

Treatise on concrete, plain and reinforced. Ed.3, rev. & rewritten. 885 p. 1916. Wiley, \$5 net.

*Engineering record*, March 24, 1917, p.475. ¾ col.

"This well-known treatise...is now brought up to date by revisions and new material, largely by S. E. Thompson following the death of Dr. Taylor...A thoroughly modern text presenting the latest data in the field."

*Proceedings of the American Society of Civil Engineers*, March 1917, p.210. ½ p.

"Revised and largely rewritten...particularly that portion relating to design and construction."

**Taylor, J. L. B.**

Handbook for rangers and woodsmen. 420 p. Wiley, \$2.50.

*Forest leaves*, April 1917, p.31. ¼ col.

"Mr. Taylor has prepared a useful handbook for those who are inexperienced in woodcraft, which was compiled after eight years of field work with the United States Forest Service. The aim has been to give short descriptions of the more important problems, avoiding, as far as possible, technical terms...The book closes with a glossary and index. Numerous illustrations aid in giving an understanding of the text."



**Terman, Lewis M.**

Measurement of intelligence. 362 p. 1916. Houghton.

*Science*, March 30, 1917, p.312. 2¼ col.

"The wide usefulness into which this volume has already come testifies to its timeliness as a treatise on the subject...So written and so organized that it serves almost equally well as a text, as a manual, or as a reference...Is clearly and simply presented in non-technical terms." *Leta S. Hollingworth.*

**Thorburn, A.**

British birds. 4v. v.3, 87 p.; v.4, 107 p. 1916. Longmans, \$10 net each.

*Auk*, April 1917, p.221. (Review of v.3-4.) 1½ p.

"All in all we think Mr. Thorburn's work will take its place as the best series of colored illustrations of British birds that has yet appeared, and is a work that should be in all reference libraries." *W. S.*

**Tilden, William A.**

Chemical discovery and invention in the twentieth century. 487 p. Dutton, 7s. 6d. net.

*Journal of the American Chemical Society*, April 1917, p.837. ½ p.

"Covers four divisions: I. Chemical Laboratories and the Work Done in Them. II. Modern Discoveries and Theories. III. Modern Applications of Chemistry. IV. Modern Progress in Organic Chemistry...Every chemist will find in the book a large amount of interesting and valuable material, and the book has been well designed to give laymen, as well as to chemists, some idea of the marvelous developments of chemistry." *W. A. Noyes.*

**Tipper, Harry, and others.**

Advertising—its principles and practice. 575 p. Ronald, \$4.

*Printing art*, April 1917, p.145. ¾ col.

"This volume is now in its second printing, an indication that there has been a good demand for the book from the start...Will be found helpful to the advertising man who already has a knowledge of his calling...will prove of value to the student desiring to learn fundamentals. In it he has access to information difficult to obtain through any other single source."

**Toch, Maximilian.**

Chemistry and technology of paints. Ed.2, rev. 366 p. Van Nostrand, \$4.

*Journal of industrial and engineering chemistry*, April 1, 1917, p.422. ½ col.

"The first edition...was published in 1907...It contained 166 pages as against 366 of the second edition...That portion of the work devoted to the analysis of paint materials has undergone most marked changes...One of the noticeable features of the book is the treatment in Chapter 10 of the inert fillers and extenders...It is up-to-date...it covers the fields suggested, by its title thoroughly, and...it is full of suggestions for further research and improvement." *P. C. McIlhiney.*

**Tracy, Susan E.**

Rake knitting and its special adaptation to invalid workers. Whitcomb & B., \$.25.

*American journal of nursing*, March 1917, p.567. ½ p.

**Treadwell, F. P.**

Analytical chemistry; ed.4, tr. & rev. by W. T. Hall. v.1: Qualitative analysis. 538 p. 1916. Wiley, 12s. 6d. net.

*Nature*, March 8, 1917, p.21. ¾ col.

"The original has been so thoroughly revised and so largely rewritten that it is no longer fair to publish the book as a literal translation."

**Turnor, Christopher.**

The land and the empire. 144 p. 1917. John Murray, 3s. 6d. net.

*Nature*, March 22, 1917, p.62. ¾ col.

"Mr. Turnor...firmly believes in the future of British agriculture if only it is properly taken in hand...[He] argues his case extremely well, and drives home his arguments with numerous diagrams illustrative of his statistics."

**Vulté, Hermann T.**

Household chemistry. 1915. Chemical, \$1.50.

*Journal of the American Chemical Society*, April 1917, p.840. 1 p.

"Readable and full of matter valuable as illustrative material to teachers of chemistry and of food in high schools and colleges alike; and especially valuable as additional reading for students in such courses." *Ruth Wheeler*.

**Waddell, J. A. L.**

Bridge engineering. 2v. 2177 p. 1916. Wiley, \$10.

*Journal of the Franklin Institute*, April 1917, p.521. 1 p.

"Dr. Waddell has made a most important and unique contribution to engineering literature. In judiciously arranged sequence he has formulated a code of practice embodying all the information he has been able to accumulate concerning every branch of bridgework during a practice of forty years. . . Primarily the work is addressed to the younger members of the profession, to whom it will undoubtedly prove a valuable guide in avoiding the many pitfalls that confront anyone whose judgment is not ripened by experience." *Percy S. Hildreth*.

**Webner, Frank E.**

Factory accounting. 357 p. 1917. La Salle Extension Univ., \$2.75.

*Scientific American*, April 7, 1917, p.364. ¼ col.

"The sixth volume of the La Salle course in higher accountancy. . . The clear definitions and statements of the author, supplemented by charts, graphs and forms, go far toward simplifying a rather complex subject."

**Webster, A. D.**

Tree wounds and diseases; their prevention and treatment. 215 p. 1916. Lippincott.

*Journal of forestry*, Feb. 1917, p.256. 1 p.

"The book is neither constructed on scientific lines, nor exhaustive of its subject; but it is, to be sure, a volume for amateurs, who may find many good suggestions in it. It is written in simple language, instructive, and avoiding tedious details." *B. E. F.*

**Weeks, Lyman Horace.**

History of paper manufacturing in the United States. 352 p. Lockwood Trade Journal Co., \$3.

*Inland printer*, April 1917, p.103. ¼ col.

"Carries the reader from the building of the first paper-mill, through the development of the process to the introduction of machinery in its manufacture and down to the twentieth century. Men, equipment and methods identified with the manufacture of paper in the United States are given much attention. . . Thoroughly indexed."

**White, L. & Prentis, E. A. jr.**

Modern underpinning. 94 p. Wiley, \$1.50.

*Building age*, April 1917, p.221. ¼ col.

"The authors. . . have had unusual opportunities to gather valuable first-hand material from the firm who handled the largest amount of the underpinning in the [William street section of the New York] subway. . . Photographs were taken to show the essential steps, these pictures in the book being supplemented by drawings and scientifically altered photographs. . . Enough text has been added. . . to make the book a valuable one upon modern underpinning."

*Scientific American*, April 7, 1917, p.364. ¼ col.

"Dealing with what has become a most important phase of construction, the work makes available to engineers and contractors a fund of valuable information that might otherwise be inaccessible."

**Williams, Clement C.**

Design of railway location. 517 p. 1917. Wiley, \$3.50.

*Proceedings of the American Society of Civil Engineers*, March 1917, p.210. ½ p.

"Basic idea in the preparation of this book. . . has been to explain and develop the underlying principles which affect the location of a railway rather than to describe current practice. . . Intended as a textbook for technical schools, but the author hopes that the subject-matter may be of value also to those engaged in practical railroad work."

**Winslow, Kenelm.**

Prevention of disease; a popular treatise. 337 p. 1916. Saunders, \$1.75 net.

*American journal of public health*, March 1917, p.331. 1½ col.

"Intended for popular consumption...Deserves almost unqualified commendation, and in nothing perhaps so much as the complete absence of sensational statements."  
Eugene R. Kelley.

**Winton, Andrew L.**

Microscopy of vegetable foods. [Ed.2.] 701 p. Wiley, \$6.50.

*American food journal*, April 1917, p.211. ¾ col.

"Just as *Food Inspection and Analysis* by Albert E. Leach and Andrew L. Winton occupies a commanding position in the literature of the chemistry of food analysis, so does this present work occupy the same relative position in the literature of food microscopy."

**Wisconsin—Geological and natural history survey.**

Physical geography of Wisconsin, by Lawrence Martin. 549 p. 1916. The State. (Bulletin no.36.)

*Nature*, Feb. 22, 1917, p.488. ¾ col.

"Primarily designed for use by teachers and in the schools."

**Woods, Clinton E.**

Unified accounting methods for industrials. 484 p. Ronald, \$5.

*American industries*, April 1917, p.42. 1¼ col.

"The author states that his book was written for three classes of people—the executive, the engineer, and the accountant; and it is certain that each will find much of interest and value...Mr. Woods proceeds to discuss each minute detail of factory routine. Practically every division of industry, from order blanks to overhead, from filing to foreman, is defined, explained, and improved."

*American machinist*, March 22, 1917, p.528. ½ col.

"Will recommend itself more to the reader who wishes to obtain a general idea of the principles underlying industrial accounting and certain phases of efficiency engineering than to one who looks for exhaustive information concerning any one of the divisions treated."

**Worsdell, W. C.**

Principles of plant-teratology. v.1. 269 p. 1915. Ray Society, London, 25s. net.

*Nature*, Feb. 22, 1917, p.485. 1 col.

"The plant morphologist will find food for thought in plenty in Mr. Worsdell's volume...Intended to present the subject in more scientific fashion and in quite a new form, both as regards the mode of treatment and the large number of additional facts."

**Wright, Wilhelmine G.**

Muscle training in the treatment of infantile paralysis. Ed.2. 1916. Ernest Gregory, \$.25.

*American journal of nursing*, March 1917, p.567. ¾ p.

"Especially opportune when so much attention must of necessity be given to the after-treatment of those who suffered from the recent epidemic. Each exercise is described in detail, the only point seemingly lacking being the length of time which should be devoted to each."

**Wymond, Mark.**

Government partnership in railroads. 192 p. Wymond & Clark, \$1.50.

*Electric railway journal*, April 7, 1917, p.674. ¼ col.

"Outlines with equal frankness the sins of regulation and the sins of steam railroads, and proposes a constructive policy having as its characteristics such features as one regulatory body with district divisions, governmental guarantee of interest and



**Wymond, Mark—continued.**

profit-sharing with the public...An earnest, common-sense attempt at constructive criticism of the existing steam railroad situation."

*Railway review*, April 14, 1917, p.539. ⅓ col.

"The particular merit of this book is timeliness; its second virtue is a clear style and logical presentation of its thought...As a whole it merits careful study."

**Wynne, Walter E. & Spraragen, William.**

Handbook of engineering mathematics. 220 p. 1916. Van Nostrand, \$2 net.

*Engineering record*, March 24, 1917, p.476. ⅓ col.

"Will prove to be extremely valuable not only to engineering students but to all practising engineers who desire a handy reference tool to give them immediate facility in the application of mathematical formulas and methods to the solution of practical problems."

*Scientific American*, April 7, 1917, p.364. ⅓ col.

"Students of engineering will find here in compact and handy form the mathematics, both theoretical and applied, most useful to their profession."

**Year-book of pharmacy and transactions of the British Pharmaceutical Conference, July 12, 1916. 540 p: Churchill, 10s.**

*Journal of the Society of Chemical Industry*, Feb. 15, 1917, p.166. ¼ col.

"Contains abstracts of the various papers on chemistry, pharmacy, and materia medica."

**Young, L. E. & Stoek, H. H.**

Subsidence resulting from mining. University of Illinois. (University of Illinois. Engineering experiment station bulletin 91.)

*Canadian mining journal*, April 1, 1917, p.151. ⅓ col.

"Contains much valuable data on a subject that is a constant source of trouble to coal miners...especially in populated districts...Deals with the whole problem of coal mine subsidence very comprehensively, giving details of actual subsidence. Full references to the legal aspect...are made...Valuable feature...is the most extensive bibliography appended...twenty-five closely printed pages...Contains some interesting references to subaqueous mining." F. W. G.

## Rules for Lending Books

1. **Hours.** The adult Lending Rooms of the Central and branch libraries are open daily from 9 a. m. to 9 p. m., Sundays and holidays excepted. The Childrens Rooms in the branches are closed after 6 p. m. The Central Childrens Room is open daily except Sundays and holidays from 9 a. m. to 9 p. m. (See Schedule of Library hours.)

2. **Borrowers.** Any resident or taxpayer of Pittsburgh is entitled to borrow books from the Library by signing the proper application and agreement and receiving a borrower's card. In the case of a child under fourteen years of age the application must also be signed by the parent or guardian.

Non-residents who can call at the Library for their books may obtain a borrower's card on payment of one dollar a year in advance. For non-residents who wish their books sent by mail or express the annual fee is two dollars. If employed or attending school in the city the guaranty of a resident tax-payer will be accepted instead of this fee.

Temporary residents may borrow books on making a deposit of five dollars, or more if deemed desirable, this sum to be returned to the depositor upon surrender of his borrower's card.

3. **Borrower's cards.** A borrower's card may be used at the Central and branch libraries.

Each borrower is responsible for all books charged on his card.

Change of residence must be reported immediately.

Lost cards should be reported at once. Adult cards will be replaced fourteen days after notice of such loss. Juvenile cards will be replaced fourteen days after notice of loss is given upon the payment of a fine of five cents, or replaced without payment six months after notice of loss is given.

4. **Issue of books.** Holders of adult cards may borrow as many books of non-fiction as are needed at one time, together with two books of fiction, only one of which shall have been published within the current or the preceding year. Holders of juvenile cards may borrow two juvenile books at one time.

Books may be kept two weeks, except some new and popular books, which may be kept but seven days. Magazines are lent for seven days only.

5. **Renewals.** Non-fiction and certain standard fiction may be once renewed for two weeks from the date on which the request for renewal is received.

*Other fiction, magazines and seven-day books are not renewable.*

Requests for renewal may be made in person, by mail, or by telephone. In each case the call number of the book, the number of the borrower's card, and the date on which the book is due must be given.

In return the borrower will receive a renewal card, which must be brought with the book when it is returned.

6. **Reserves.** Books may be reserved at the Library by payment of one cent for a postal card notice. As soon as the book is returned to the Library, this postal card will be mailed to the person making the request, and the book will be reserved two days. Requests for reserves may be made by telephone, in which case the cost of the postal card will be collected when the borrower calls for the book.

7. **Fines.** A fine of two cents a day (including Sundays and holidays) must be paid on each book kept overtime. The holder of a juvenile card may forfeit the use of his card for six months from the date upon which an overdue book is returned in place of payment of this fine. If a book is not returned within three weeks after the date on which it is due, a messenger will be sent for it. This messenger has authority to collect the fine incurred and an additional fee of twenty-five cents for messenger service.

A borrower must pay for books lost or injured while charged on his card. No books may be borrowed until fines and claims for damages have been paid.

No claim can be established because of the failure of the Post Office to deliver notices to or from the Library.



## Publications of the Library Now in Print

Where two prices are given, the first is that for which the publication is sold at the Library only. All prices are strictly net, except for individual publications ordered in lots of twenty or more. Remittances must be made in advance, payable to Carnegie Library of Pittsburgh. All publications not marked \* may be had free at the Library, or will be sent postpaid for 5 cents each.

### \*Classified Catalogue of the Carnegie Library of Pittsburgh.

FIRST SERIES, 1895-1902. 1907. vol. 1-3. 3,890 pp. \$12.00.

SECOND SERIES, 1902-1906. 1908. vol. 4-5. 2,020 pp. \$5.00.

THIRD SERIES, 1907-1911. 1914. vol. 6-8. 3,475 pp. \$8.00.

Bound in buckram with gilt tops. Include full author and subject indexes.

*The same* [in pamphlet form].

FIRST SERIES, 1895-1902. 10 parts. 1903-07.

Part 1. General Works. 1907. 67 pp. 10 cents, postpaid.

Part 2. Philosophy and Religion. 1903. 223 pp. Out of print.

Part 3. Sociology and Philology. 1904. 340 pp. 15 cents; postpaid, 25 cents.

Part 4. Natural Science and Useful Arts. 1904. 598 pp. 35 cents; postpaid, 50 cents.

Part 5. Fine Arts. 1905. 351 pp. 15 cents; postpaid, 25 cents.

Part 6. Literature. 1905. 308 pp. 15 cents; postpaid, 25 cents.

Part 7. Fiction. 1906. 446 pp. 25 cents; postpaid, 40 cents.

Part 8. History and Travel. 1907. 691 pp. 50 cents; postpaid, 65 cents.

Part 9. Biography. 1907. 381 pp. 20 cents; postpaid, 30 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1907. 850 pp. \$1.00; postpaid, \$1.20.

SECOND SERIES, 1902-1906. 5 parts. 1907-08.

Part 1. General Works, Philosophy, Religion, Sociology and Philology. 1907. 425 pp. Out of print.

Part 2. Natural Science, Useful Arts and Fine Arts. 1907. 477 pp. 45 cents; postpaid, 60 cents.

Part 3. Literature, English Fiction and Fiction in Foreign Languages. 1908. 342 pp. 40 cents; postpaid, 50 cents.

Part 4. History and Travel, Collected Biography and Individual Biography. 1908. 465 pp. 45 cents; postpaid, 60 cents.

Part 5. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1908. 460 pp. 80 cents; postpaid, 95 cents.

THIRD SERIES, 1907-1911. 10 parts. 1912-14.

Part 1. General Works, Philosophy, Religion. 1912. 372 pp. 40 cents; postpaid, 50 cents.

Part 2. Sociology, Philology. 1912. 418 pp. 45 cents; postpaid, 60 cents.

Part 3. Natural Science, Useful Arts. 1913. 623 pp. 60 cents; postpaid, 75 cents.

Part 4. Fine Arts. 1913. 237 pp. 25 cents; postpaid, 35 cents.

Part 5. Literature. 1913. 271 pp. 30 cents; postpaid, 40 cents.

Part 6. English Fiction, Fiction in Foreign Languages. 1913. 294 pp. 30 cents; postpaid, 40 cents.

Part 7. History and Travel. 1914. 401 pp. 40 cents; postpaid, 50 cents.

Part 8. Biography. 1914. 276 pp. 30 cents; postpaid, 40 cents.

Part 9. Books for the Blind. 1914. 44 pp. 5 cents; postpaid, 10 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1914. 816 pp. 80 cents; postpaid, \$1.00.

**Monthly Bulletin.** 50 cents a year, postpaid.

Not published in August and September.

**Annual Reports, 1st-20th.** 1897-1916. Sent free upon request.

Except the 3d, 6th and 20th, which are out of print.

**Catalogue of the Carnegie Library School; a Training School for Children's Librarians.** Sent free upon request.

**Periodicals and Other Serials Currently Received by the Carnegie Library of Pittsburgh.** 7th edition. 1915. 42 pp.

**Books in the Library of the American Philatelic Society.** 1910. 20 pp.

- Carnegie Institute and Library of Pittsburgh. 1916. 32 pp.  
 Gift of the German Emperor [List of Books, Maps and Photographs].  
 1908. 17 pp.  
 Rules for Filing Cards in the Dictionary Catalogues of the Carnegie  
 Library of Pittsburgh. 2d edition. 1917. 32 pp.  
 What a Public Library Finds to Do; by Elisa May Willard. 1917. 18 pp.

## Reference Lists

### History

- Books of Interest in Connection with the European War. 1914. 26 pp.  
 Braddock's Expedition. 11 pp. (Monthly Bulletin, Nov. 1906.)  
 Expedition of General Forbes against Fort Duquesne. 1908. 20 pp.  
 Expeditions of Colonel Bouquet to the Ohio Country, 1763 and 1764.  
 11 pp. (Monthly Bulletin, Dec. 1909.)  
 Letters of General Forbes; Reprint of 35 Letters Relating to the Ex-  
 pedition against Fort Duquesne. 63 pp. 20 cents, postpaid.  
 (Monthly Bulletin, Feb.-May 1909.)  
 \*Pennsylvania; a Reading List for the Use of Schools, with Special  
 Reference to Indian Warfare and the Local History of Pitts-  
 burgh. 1911. 83 pp. 20 cents; postpaid, 25 cents.  
 Pittsburgh in 1816. 1916. 75 pp.  
 Washington's Visits to Pittsburgh and the Ohio Country. 15 pp.  
 (Monthly Bulletin, Feb. 1908.)  
 The Whiskey Insurrection. 9 pp. (Monthly Bulletin, July 1906.)

### Biography

- Famous Royal Women; a Reading List for Girls. 1908. 11 pp.  
 Lives and Letters; a Selected and Annotated List. 1910. 36 pp.  
 \*Men of Science and Industry; a Guide to the Biographies of Scientists,  
 Engineers, Inventors and Physicians, in the Carnegie Library of  
 Pittsburgh. 1915. 189 pp. 20 cents; postpaid, 30 cents.  
 Patriots; a Reading List for Boys and Girls. 1912. 17 pp.

### Sociology

- Housing. 1912. 45 pp.  
 Vocational Guidance. Supplement. 10 pp. (Monthly Bulletin, Dec.  
 1915.)

### Debating

- \*Debate Index. 2d edition. 1912. 84 pp. 15 cents; postpaid, 20 cents.  
 Debate Index. Supplement. 1913. 23 pp.  
 Debate Index. Second supplement. 1916. 15 pp.  
 Debate Index. Third supplement. 1917. 14 pp.

## Publications of Interest to Engineers

- Air-Brakes. 1915. 55 pp.  
 Air Conditioning. 1914. 58 pp.  
 Brick Manufacture and Bricklaying. 26 pp. (Monthly Bulletin, Jan.  
 1912.)  
 By-Product Coking. 1915. 40 pp.  
 Electric Driving in Rolling-Mills and Foundries. 11 pp. (Monthly  
 Bulletin, Nov. 1907.)  
 Electric Heating and Cooking. 1910. 16 pp.

- Engineering Ethics. 1917. 17 pp.  
 Floods and Flood Protection. 48 pp. (Monthly Bulletin, July 1908.)  
 Floods and Flood Protection. Supplement. 1911. 19 pp.  
 Housing. 1912. 45 pp.  
 \*Index to Proceedings of the Engineers' Society of Western Pennsylvania, Volumes 1 to 20, 1880-1904; Compiled by Harrison W. Craver. 1906. 144 pp. \$1.00 postpaid.  
 \*Index to the Classified Catalogue of the Technology Department. 2d edition. 1916. 63 pp. 10 cents.  
 List of Technical Indexes and Bibliographies Appearing Serially. 1910. 17 pp.  
 \*Men of Science and Industry; a Guide to the Biographies of Scientists, Engineers, Inventors and Physicians, in the Carnegie Library of Pittsburgh. 1915. 189 pp. 20 cents; postpaid, 30 cents.  
 Metal Corrosion and Protection. 2d edition, revised and enlarged. 58 pp. (Monthly Bulletin, July 1909.)  
 Mica. 12 pp. (Monthly Bulletin, Oct. 1908.)  
 One Hundred Recent Books on Agriculture. 1910. 19 pp.  
 Refuse and Garbage Disposal. 1909. 39 pp.  
 Road Dust Preventives. 1916. 39 pp.  
 Scientific and Technical Reference Books. 19 pp. (Monthly Bulletin, Nov. 1916.)  
 \*Sewage Disposal and Treatment. 1910. 96 pp. 15 cents, postpaid.  
 Smoke Prevention. 18 pp. (Monthly Bulletin, May 1907.)  
 Sodium Nitrate Industry of Chile. 7 pp. (Monthly Bulletin, March 1908.)  
 Steam Turbines. 21 pp. (Monthly Bulletin, Nov. 1904.)  
 Water Softening. 8 pp. (Monthly Bulletin, June 1904.)

### Library Work with Children

- \*Catalogue of Books in the Childrens Department of the Carnegie Library of Pittsburgh. 1909. 604 pp. 75 cents; postpaid, \$1.00.  
 \*Catalogue of Books, Annotated and Arranged, and Provided by the Carnegie Library of Pittsburgh for the Use of the First Eight Grades in the Pittsburgh Schools. 1907. 331 pp. 35 cents; postpaid, 50 cents.  
 \*Annotated Catalogue of Books Used in the Home Libraries and Reading Clubs. 1905. 110 pp. 20 cents; postpaid, 25 cents.  
 Illustrated Editions of Children's Books. 1915. 20 pp.

### Story-Telling

- Stories from the Ballads of Robin Hood; Outlines for Story-Telling. 1914. 38 pp.  
 Stories from the Norse; Outlines for Story-Telling. 1914. 22 pp.  
 \*Stories to Tell to Children. 1916. 68 pp. 25 cents.  
 Story Hour Courses for Children from Greek Myths, The Iliad and The Odyssey. 1906. 32 pp.

### Reading Lists

- Famous Royal Women; a Reading List for Girls. 1908. 11 pp.  
 "Foreign Lands Where Wonders Are." 1911. 14 pp.  
 Patriots; a Reading List for Boys and Girls. 1912. 17 pp.  
 \*Pennsylvania; a Reading List for the Use of Schools, with Special Reference to Indian Warfare and the Local History of Pittsburgh. 1911. 83 pp. 20 cents; postpaid, 25 cents.



P  
Bb  
T

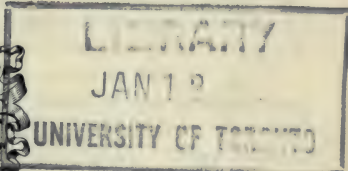
# TECHNICAL BOOK REVIEW INDEX

ISSUED BY THE TECHNOLOGY DEPARTMENT OF THE  
CARNEGIE LIBRARY OF PITTSBURGH

Vol. 1

JULY 1917

No. 4



PITTSBURGH  
CARNEGIE LIBRARY  
1917



## Preface

This index, printed from part of a card-index maintained by the Carnegie Library of Pittsburgh, is a record of certain book reviews appearing in the scientific, technical and trade journals currently received in the Technology Department. It is concerned mainly with books on pure and applied science, but includes a few on allied subjects. Its purpose is primarily to *index* reviews rather than to compete with any existing booklist by suggesting books on any subject, or by furnishing bibliographic information. In accordance with this plan, the arrangement is by authors, though the form of entry, being determined from the review and not from the book itself, is in some cases doubtless incorrect.

Except for the correction of obvious errors, the bibliographic information is as given in the review, or as combined from two or more reviews when several are indexed. Since many of the reviews are carelessly done, the information given is, in many cases, both inaccurate and incomplete. In general the names of publishers are abbreviated in accordance with the practice in the more important book-trade bibliographies. Titles of journals are as a rule given in full.

Each quotation immediately follows the name of the journal from which it is taken. Obviously these brief extracts, thus detached from the context, must not be accepted as conclusive. Very often a review is so equivocal that there can be no unanimity of opinion as to whether it is favorable or unfavorable. For this reason no estimate is given here. Except for this one omission, this index is an exact copy of cards filed in the book review index of the Carnegie Library of Pittsburgh.

The "Technical Book Review Index," published in April and July 1915 by the Index Office, Inc., Chicago, consisted of a record of technical book reviews furnished by the Carnegie Library of Pittsburgh.

The Monthly Bulletin of the Carnegie Library of Pittsburgh for March, April and May included the first three issues of the Technical Book Review Index. As the number of books so reviewed is large, and as the value of such an index has been made evident by the demand for the three numbers already published, it has been decided to issue it as a separate publication instead of including it in the Monthly Bulletin. It is not practicable, for this year at least, to issue it each month; therefore for the rest of the year it will appear as a quarterly, the other two numbers to be published in October and December.

The price of the Index is fifty cents for the year, this to include the three numbers published in the Bulletin and the three separate numbers.



## Technical Book Review Index

### Abenbéder.

Compendio de álgebra; texto árabe, traducción y estudio por José A. Sánchez Pérez. 1916. Junta para Ampliación de Estudios e Investigaciones científicas, Madrid.

*Bulletin of the American Mathematical Society*, April 1917, p.325. 1½ p.

"The translator, who has an enthusiastic hope that some day an adequate history of mathematics in Spain will be written, sees in this manuscript a contribution of material for such a book. But the translation is of value for another reason: it makes accessible to the mathematical world in general another of the works compiled by the Mussulmans between the eighth and fifteenth centuries." *E. B. Cowley.*

### Acevedo, Octavio A.

Topicos tecnicos. 1917. "El Progreso," Emiliano Espinal, Santo Domingo.

*Engineer*, April 13, 1917, p.339. ¾ col.

"Well written, in an easy though literary Spanish... In describing work in progress or contemplated the author bases his arguments on what may be called the fundamental truths of engineering."

### Adams, Henry Foster.

Advertising and its mental laws. 329 p. Macmillan, \$1.50 net.

*Canadian engineer*, May 31, 1917, p.460. ¼ col.

"Interesting study of the psychology of advertising for the advertising man and for the student, containing, in addition to the theoretical material, much experimental data... Valuable addition to advertising literature, and one of the most practical and thorough books... on the subject. Its study will unquestionably be of great benefit to every advertising man."

### Agg, T. R.

Construction of roads and pavements. 1916. Hill Pub. Co., 12s. 6d. net.

*Engineering*, April 6, 1917, p.313. 2 col.

"Mr. Agg... is armed with statistics at all points, and is ready to give sound advice based on a wide experience."

### Akimoff, N. W.

Elementary course in Lagrange's equations. 195 p. 1917. Phil. Bk. Co., \$2.

*Journal of the American Society of Mechanical Engineers*, May 1917, p.485. 1 col.

"Familiarity with the methods of the calculus and a ready interpretation of symbolic notation are essential to its reading... There are hardly any references to engineering practice illustrative of the problems dealt with. The treatment of the subject may therefore be characterized as academic." *Walter Rautenstrauch.*

Alford, L. P. See **Manufacture** of artillery ammunition.

### Alt, Harold L.

Mechanical equipment of school buildings. 108 p. Bruce, \$2.50.

*Heating and ventilating magazine*, May 1917, p.57. ½ col.

"Compilation... of a series of articles that appeared recently in the *American School Board Journal*... Expresses throughout the author's own experience as a designing and supervising engineer."

### Amar, Jules.

Organisation physiologique du travail. 374 p. 1917. Dunod & Pinat, Paris, 18 fr.

*Le Génie civil*, April 28, 1917, p.284. ½ col.

*Revue générale de chimie pure et appliquée*, Nov.-Dec. 1916, p.131. ¼ col.

**American Gas Institute**—Sub-committee on chemical tests.

Gas chemists' hand-book. 345 p. 1916. The Institute, \$3.50.

*Journal of the Franklin Institute*, May 1917, p.652. ½ p.

"A collection of analytic procedures for use by gas chemists, with some accessory matters, such as tests of construction materials, alloys and lubricating oils. Many of the methods are in tentative form...The work is well printed, liberally illustrated, and correct chemical terms are mostly used." *Henry Leffmann*.

**[American Pharmaceutical Association.]**

National formulary. Ed.4. 394 p. 1916. The Association.

*American journal of public health*, May 1917, p.506. 1¼ col.

"Introductory...includes a short history, and a preface in which the changes are summarized. This portion...contains a list of preparations added and dropped from the formulary; also a list of changes in the official Latin titles." *J. Gaub*.

**American Public Health Association.**

Standard methods for the examination of water and sewage. The Association, Boston, \$1.25.

*Canadian engineer*, April 26, 1917, p.361. 1½ col.

"Should be added to the library of everyone who is interested in the examination of water and sewage." *Joseph Race*.

*Engineering news-record*, April 19, 1917, p.152. ½ col.

"Revised by committees of the American Public Health Association, American Chemical Society and referees of the Association of Official Agricultural Chemists... The technic of water and sewage analysis, chemical, microscopic and bacterial, is presented in workable detail, yet in small compass...The bacterial section has been overhauled...Useful bibliographies are included."

**Anderson, C.**

Bibliography of Australasian mineralogy. New South Wales Geological Survey.

*Mining magazine*, March 1917, p.176. ¼ col.

"This volume is No. 22 of Mineral Resources...The author is mineralogist to the Australian Museum. The references to occurrences of minerals are classified under the authors' names, then comes an index to these under each individual mineral, and then an index to the minerals under place names."

**Andés, Louis Edgar.**

Drying oils, boiled oil, and solid and liquid driers; ed.2, rev. by H. B. Stocks. 340 p. Scott, Greenwood, 13s. 2d.

*Oil, paint and drug reporter*, April 23, 1917, p.14. ½ col.

"This second edition, just issued, is intended to represent present knowledge of processes and materials."

**Andrews, E. S. & Heywood, H. B.**

Calculus for engineers. 269 p. Van Nostrand, \$1.25. (Broadway series of engineering handbooks, v.13.)

*Electric journal*, June 1917, adv. sec., p.54. ½ col.

**Andrews, Ewart S.**

Further problems in the theory and design of structures. Chapman, 7s. 6d.

*Aeronautics*, April 11, 1917, p.270. ½ col.

"A thoroughly sound book on the theory and design of structures, which should prove extremely useful to the serious student of aviation...Equally valuable to the engineer engaged in the design of structures and to the student...Well written throughout; concise yet full and free from 'padding.'"

**Annual** chemical directory of the United States; ed. by B. F. Lovelace. 305 p. Williams & Wilkins Co., \$5.

*American food journal*, May 1917, p.271.  $\frac{1}{2}$  col.

"Several important lists of names."

*American industries*, May 1917, p.42.  $\frac{1}{2}$  col.

"Is no chance publication... it has been carefully compiled from direct and authoritative sources, with the avowed purpose of aiding our national preparedness by advancing this particular industry."

*India rubber world*, June 1, 1917, p.529.  $\frac{1}{2}$  col.

"The first issue... Scope of the volume is comprehensive, the contents accurate, and the arrangement such as to render the desired address almost instantly available... All listings have been made gratis... Each section is alphabetically arranged throughout; first by subheads, then by states and finally by names. Chemists are classified as consulting, analytical, and chemical engineers; laboratories, as Federal and State, municipal, industrial and professional."

*Iron trade review*, May 3, 1917, p.979.  $\frac{1}{2}$  col.

**Armstrong, Donald B. and others.**

Methods of investigation in social and health problems. 24 p. Russell Sage Foundation, \$20.

*Mind and body*, May 1917, p.147.  $\frac{1}{2}$  p.

"How to avoid pitfalls of inaccuracy in the study and use of statistics is discussed... by three specialists."

**Arny, Henry V.**

Principles of pharmacy. Ed.2, rev. 1,056 p. 1917. Saunders, \$5.50 net.

*Druggists circular*, April 1917, p.209.  $\frac{1}{2}$  col.

"Well adapted for the study and review of the art and science of pharmacy, and will no doubt meet with the expressed approval of the profession."

*Journal of the American Pharmaceutical Association*, May 1917, p.510. 2 col.

"Professor Arny's knowledge of theoretical and practical pharmacy has been and is to-day conceded by all in position to judge, and this same knowledge is passed on to others in most acceptable form in his book... Extended study is definitely pointed out by the bibliography that is so prominent a feature throughout the work... Another noticeable feature is its broadness and adaptability for use by pharmacists in all sections of the country." *Elie H. La Pierre*.

**Arthur, William.**

Estimating building costs. 218 p. Williams, \$1.

*Building age*, May 1917, p.277.  $\frac{1}{4}$  col.

"An important addition to the literature upon estimating... for it presents in simple fashion the underlying principles of the subject... The figures... are for the most part given in actual quantities of material required and in actual hours of labor necessary to put them in place—thus allowing costs to be adjusted to suit local conditions and prices."

**Ashton, William Easterly.**

Textbook on the practice of gynecology. Ed.6, thoroughly revised. 1916. Saunders, \$6.50 net.

*Saint Paul medical journal*, April 1917, p.130.  $\frac{1}{2}$  col.

"As a catalogue of definite knowledge, with headings, sub-headings, references, parentheses, etc., it is replete, and must find many admirers." *Frederic E. Leavitt*.

**Assheton, Richard.**

Growth in length; embryological essays. 104 p. 1916. Cambridge University Press.

*American journal of science*, May 1917, p.421.  $\frac{1}{2}$  p.

**Atack, F. W. & Whinyates, L. ed.**

Chemists' year book, 1917. 2v. 1917. Sherratt & H. 10s. 6d.

*Journal of the Society of Dyers and Colourists*, May 1917, p.127.  $\frac{1}{2}$  col.

"Has now won its well-earned place as one of the annual necessities with which analytical and industrial chemists must provide themselves."



**Atkinson, Henry.**

Rational wage system. 112 p. G. Bell, London, 1s. 3d. net.

*Practical engineer (London)*, May 10, 1917, p.227. ½ col.

"Mr. Atkinson...has set out here a 'method of paying a worker a reward for efficiency in addition to wages.'"

**Austin, F. E.**

Examples in alternating currents. Ed.2. v.1. 223 p. 1916. Author, Hanover, N. H., \$2.40.

*National engineer*, June 1917, p.260. ¾ col.

"While primarily intended for electrical engineering students, will be found to be of interest to steam, mechanical and civil engineers as well...To make any use of the book one must have a working knowledge of geometry, trigonometry and algebra."

**Austin, F. E.**

How to make low-pressure transformers. Ed.3. 22 p. Author, Hanover, N. H., \$.40.

*National engineer*, June 1917, p.260. ½ col.

"Very interesting, instructive and essentially practical little book, and any one who is interested in low pressure transformer construction or experiments will find this just what he wants."

**Austin, F. E.**

Preliminary mathematics. 168 p. 1917. Author, Hanover, N. H., \$.1.20.

*American machinist*, May 17, 1917, p.880. ¼ col.

"Intended for students who wish to make up for lost time in their mathematical preparation...There is no word of inspiration in the book, simply rules of procedure, and the threat that if the pupil does not work consistently day by day he will not be able to pass the examinations."

*Canadian engineer*, May 31, 1917, p.462. ½ col.

"Should be quite useful to students or to older persons desirous of learning a little elementary mathematics themselves, which is the object the author has in view." *Alfred S. L. Barnes.*

*Electrical age*, May 1917, p.52. 3 l.

"A text book for use by students. Recommended for those who desire a knowledge of algebra sufficient for them to use this valuable means to solve everyday problems."

*Power*, May 22, 1917, p.716. ½ col.

"Intended to provide a connecting link between the study of arithmetic and algebra and was originally prepared for the use of those whose education had been limited, but the text has been remodeled so as to adapt it for high school students."

*Scientific American supplement*, June 2, 1917, p.352. ¼ col.

"Among the more definite aims of this text-book...is that of making easy the transition from arithmetic to algebra; its main object is to fit the pupil to solve problems, and to this end it explains many points omitted from the ordinary text-book with which it is intended to be used as an auxiliary...Also valuable as a reference book."

**Aydelotte, Frank.**

English and engineering. 390 p. McGraw, \$1.50 net.

*Canadian engineer*, May 31, 1917, p.460. 1½ col.

"Mr. Aydelotte is the professor of English in the Massachusetts Institute of Technology and his object in making the selections is to help students to express themselves in writing and speaking, not merely grammatically but with order, force, sincerity and such charms as their natures will allow." *R. O. Wynne-Roberts.*

*Engineering and mining journal*, April 21, 1917, p.725. ½ col.

"Collection of isolated essays by the peers of English literature."

**Bacon, Raymond Foss, & Hamor, W. A.**

American petroleum industry. 2v. v.1, 446 p.; v.2, 516 p. McGraw, \$10.

*Engineering news-record*, May 17, 1917, p.363. ½ col.

"Volume I deals with the natural product and Volume II with refining."

**Bandler, Samuel Wyllis.**

The expectant mother. 213 p. 1916. Saunders, \$1.25.

*American journal of nursing*, May 1917, p.754. ¼ p.

"Painstaking effort does not enable one to find any new ideas in this book, but this does not mean that it has not actual merit."

**Barber, F. D. and others.**

First course in general science. 607 p. 1916. Holt.

*Physical review*, May 1917, p.440. ¼ p.

"On the whole the subject matter seems to be well selected." O. M. S.

**Barber, H.**

The aeroplane speaks. 144 p. McBride, Nast, \$1.90.

*Aviation and aeronautical engineering*, May 15, 1917, p.344. ½ col.

"We feel certain that this is one of the most fascinating books dealing with aeroplanes ever published. . . The main definitions are given in accurate and easy form, with excellent sketches. . . The chapter on Stability and Control is most clear and accurate. . . Should be most useful to pilots training for military service, and to conscientious instructors who wish to give their pupils something more than a rule of thumb knowledge of their machines."

**Barbillion, L.**

Groupes électrogènes en régime troublé. Gauthier-Villars, Paris, 11 fr.

*Electrical review*, March 16, 1917, p.297. ½ col.

"Deals with the functioning of what he calls 'groupes électrogènes,' that is, with combinations of at least two machines, one of which is a generator of electricity and another a motor of any kind driving it. The question of the regulation and governing of such groups is gone into very thoroughly, from the theoretical point of view."

**Barker, Harry.**

Public utility rates. 387 p. 1917. McGraw, \$4.

*Gas age*, May 15, 1917, p.502. ½ col.

"Author is associate editor of the *Engineering News-Record* and this work represents eight years of labor in the collection and formulation of the data given."

*Journal of the Western Society of Engineers*, March 1917, p.186. ¾ p.

"He has endeavored to make a broad survey of the rate problem free from the mass of obscuring detail which necessarily marks individual cases, with the hope that it would be useful to lawyers and legislators, editorial writers and the general public, as well as to engineers."

**Barrow, Isaac.**

Geometrical lectures; tr. with notes and proofs, etc. by J. M. Child. Open Ct., 4s. 6d. net.

*Iron and coal trades review*, May 11, 1917, p.551. ½ col.

**Battle, John Rome.**

Lubricating engineer's handbook. 333 p. Lippincott, \$4.25 net.

*Canadian engineer*, May 31, 1917, p.462. ½ col.

"An admirable, useful and concise publication. . . Cannot fail to be appreciated universally." C. I. Grierson.

**Bell, Herbert.**

Course on the solution of spherical triangles for the mathematical laboratory. 66 p. 1915. G. Bell.

*Bulletin of the American Mathematical Society*, April 1917, p.331. 1 p.

"The author keeps his object clearly in mind, goes directly at it, maintains a good proportion of parts in definition, exposition, and illustration, and the result is a practical syllabus of the subject in brief space." A. M. Kenyon.

**Berg, E. J.**

Electrical engineering; advanced course. 332 p. Hill, 15s. net.

*Electrician*, May 11, 1917, p.231.  $\frac{3}{4}$  col.

"Contains abstracts of a series of lectures intended to prepare the student to understand and to deal mathematically with phenomena which are incidental to abnormal or transient conditions in electric circuits...To many students in the past the works of the great masters have been sealed, and in this book 50-year old discoveries are presented in such a way as to be within the grasp of engineering students of average intelligence."

**Billings, Frank, ed.**

General medicine. Year Book Pub. Co., \$1.50.

*Saint Paul medical journal*, April 1917, p.130.  $\frac{1}{2}$  col.

"Although...largely devoted to the recent advances in physiology, general diagnosis and treatment of the gastro-intestinal diseases, the infectious diseases are also adequately given." *Alfred Hoff*.

**Binet, Léon.**

Le guide du médecin aux tranchées. 94 p. 1916. Doin, Paris, 2 fr.

*Revue générale des sciences pures et appliquées*, Feb. 28, 1917, p.126.  $\frac{3}{4}$  col.

**Bird-lore. See Ingersoll, Ernest.****Boswell, P. G. H.**

British resources of sands suitable for glass making. 92 p. 1916.

Longmans, \$50 net.

*Scientific American*, May 26, 1917, p.533.  $\frac{1}{2}$  col.

"The war has spurred England to a minute examination of British sands, in the hope of satisfactorily replacing imported sands the supply of which has been cut off by the war. The investigation has yielded some very practical results which are embodied in this monograph, which is published under instructions from the Ministry of War."

**Bowman, Isaiah.**

Andes of southern Peru. 336 p. 1916. Holt.

*American journal of science*, May 1917, p.416.  $1\frac{1}{2}$  p.

"Essentially the record of a reconnaissance along the seventy-third meridian, between parallels of latitude  $12^{\circ}$  and  $16^{\circ} 37'$  south." *H. E. G.*

**Breslich, E. R.**

Second-year mathematics for secondary schools. Ed.2. 1916.

Univ. of Chicago Press.

*Bulletin of the American Mathematical Society*, April 1917, p.328.  $2\frac{3}{4}$  p.

"One of the numerous recent attempts to correlate elementary algebra, geometry, and trigonometry for purposes of instruction...Correlation...to be successfully realized...must be based on some central and unifying principle...A careful examination of the present work fails to reveal any such principle of selection or arrangement." *S. E. Slocum*.

**British engineering index and buyers' manual. E. T. Heron.**

*Engineer*, May 11, 1917, p.421.  $\frac{1}{2}$  col.

"Intended to show where everything to do with engineering can be purchased. It is divided into two parts. The first is a directory of firms which contains the names and addresses—postal and telegraph—and in some cases telephone numbers of 3240 firms in alphabetical order...Second part contains a list of articles, and...numbers...referring to the firm or firms...which make the article."

**British journal photographic almanac, 1917; ed. by G. E. Brown. 779 p. H. Greenwood.**

*Journal of the Royal Society of Arts*, April 20, 1917, p.429.  $\frac{3}{4}$  col.

"Well-known and useful book of photographic reference...Facts, formulae, processes, tables, etc., are as abundant and full as ever."



**Broad, C. D.**

Perception, physics and reality; an inquiry into the information that physical science can supply about the real. 388 p. 1914. Cambridge University Press, 10s.

*Revue générale des sciences pures et appliquées*, March 15, 1917, p.155. 1 col.

**Broadbent, Frank.**

Dynamo and motor attendants and their machines. Ed.8. 212 p. Rentell, 2s. 6d. net.

*Electrician*, May 4, 1917, p.193.  $\frac{4}{5}$  col.

"The beginner may expect to find a solution of most of his working difficulties, together with a description of the various kinds of dynamos, motors and their accessories, and the whole is spiced with the experience of a man who has seen a good deal of the working side of an engineer's life." *W. H. S.*

**Brown, Harold W.**

Electrical equipment; its selection and arrangement, with reference to factories, shops, and industrial plants. 229 p. McGraw, \$2 net.

*Engineering news-record*, May 17, 1917, p.363.  $\frac{1}{2}$  col.

"Non-electrical men who have problems in the selection and use of electrical equipment put up to them, will welcome Mr. Brown's lectures...Supplements, and does not duplicate, existing recognized texts."

**Brown, William Alden.**

Portland cement industry; a practical treatise on the building, equipping and economical running of a Portland cement plant, with notes on physical testing. Crosby Lockwood, 7s. 6d. net.

*Engineering*, April 20, 1917, p.383.  $2\frac{3}{4}$  col.

"Mr. Brown...finds his opportunity for urging greater enterprise and alertness by discussing the present position and prospects of the Portland cement trade. His view is gloomy, but his dismal Cassandra warnings are tempered with wholesome advice and skilled counsel."

**Browne, Warren C. comp. and ed.**

Offset lithography. 200 p. National Lithographer, \$3.

*Inland printer*, June 1917, p.392.  $\frac{1}{2}$  col.

"Devoted to offset work...photolithography and tin-plate decoration...Besides numerous recipes and formulas in the text, there is a chapter devoted to solutions, formulas and other useful hints to workers...Should be read by typographic printers as well as by lithographers."

**Bryson, Thomas, & Chambers, G. M.**

Introduction to mine surveying. 288 p. Arnold, 5s. net.

*Colliery guardian*, March 9, 1917, p.493.  $\frac{1}{4}$  col.

"Object...is to provide an elementary handbook for students' use. Its scope is such as to ensure qualification for the serious candidate at any of the ordinary examinations in surveying...Arranged to cover a two years' course, and importance is attached to the order in which the chapters are arranged...Can be thoroughly recommended."

**Buchanan, J. Y.**

Comptes rendus of observation and reasoning. 452 p. 1917. Cambridge University Press, 7s. 6d. net.

*Nature*, April 19, 1917, p.142.  $1\frac{1}{2}$  col.

"Consists of a selection on many subjects, scientific and popular, several reproduced from the pages of *Nature*. The strictly scientific memoirs deal with the relation of ice and brine, steam and brine, calorimetry, and the occurrence of ice in *Nature*, mainly in the form of glaciers...The memoirs themselves form solid and informing reading for students; but they are rendered entertaining by the extraordinarily copious analytical Table of Contents, which occupies thirty pages." *H. R. M.*

**Burns, G. P. & Otis, C. H.**

Trees of Vermont. 244 p. 1916. The Station, Burlington. (Vermont Agricultural Experiment Station. Bulletin 194.)

*Journal of forestry*, April 1917, p.478. ½ p.

"Descriptive bulletin written primarily for public school pupils and others not specially trained in botany." *J. H. W.*

**Burrell, George A.**

Gasoline and how to use it. 281 p. Oil Statistical Society, \$1.50.

*Aviation and aeronautical engineering*, June 1, 1917, p.397. 1 col.

"A mine of valuable information...Deals with every possible aspect of the subject in a concentrated but authoritative manner."

**Burton, Eli Franklin.**

Physical properties of colloidal solutions. 200 p. 1916. Longmans, \$1.80. (Monographs on physics.)

*Physical review*, May 1917, p.443. ¾ p.

"One of the Monographs on Physics, edited by Sir J. J. Thomson and Dr. Horton. In every respect it is admirable...The statement of theories is in every case clear and the conclusions drawn are as definite as one could expect under the circumstances. The two indexes are most helpful. In short, no book has yet appeared in English or any other language which brings so many facts together, so well coördinated and so well described." *J. S. A.*

**Butler, Edward.**

Vaporisation of paraffin for high speed motors. Griffin, 3s. 6d. net.

*Practical engineer*, April 12, 1917, p.179. ¾ col.

"Mr. Butler deals with the subject from the point of what has been done in the past, and his book is interesting and instructive."

**Butterworth's** workingmen's compensation cases. v.9. 714 p. Butterworth.

*Colliery guardian*, March 23, 1917, p.591. ½ col.

"Excellent and exhaustive series of reports...The new volume deals with appeals heard from October 1915 to October 1916...A considerable proportion...consist of colliery cases."

**Cajori, F.**

William Oughtred, a great seventeenth-century teacher of mathematics. 100 p. 1916. Open Ct., 4s. net.

*Science progress*, April 1917, p.694. ¾ p.

"Oughtred played a large part in the teaching of mathematics in the seventeenth century in England...This monograph...gives a short, clear, and readable account of the man and his works." *W. W. Rouse Ball.*

**Calkins, Charlotte Wait.**

Course in house planning and furnishing. 79 p. 1916. Scott, \$.60.

*Journal of home economics*, June 1917, p.289. 1½ col.

"A definitely organized body of material, dealing with the practical application of art principles to the problems of house planning and furnishing." *Ethelwyn Miller.*

**Canada—Mines branch.** (Department of mines.)

Weathering of coal, by J. B. Porter. 194 p. [1915.] The Department.

*Power*, May 1, 1917, p.610. ¼ col.

"An extra volume supplementing Report No. 83 ['An investigation of the coals of Canada']...Much valuable information has been compiled, and the volume will be of value to those who are interested in the subject."

**Carlson, Anton Julius.**

Control of hunger in health and disease. 319 p. 1916. Univ. of Chicago Press, \$2.

*Journal of home economics*, May 1917, p.241. 2 col.

"The beginner in physiology...and the critical reader alike, can hardly fail to be impressed with the ingeniously planned, patiently collected, carefully correlated mass of experimental evidence presented." *Minna C. Denton*.

*Nature*, March 15, 1917, p.41. 1½ col.

"A very valuable and interesting account of a somewhat neglected branch of physiology."

**Cary, Edward R.**

Geodetic surveying. 280 p. 1916. Chapman, 10s. 6d. net.

*Science progress*, April 1917, p.710. 1 p.

"'Precision' and 'method' are the keynotes of the whole volume—'cost' at the same time receiving careful consideration." *J. Wemyss Anderson*.

**Chapman, Charles F.**

Practical motor boat handling, seamanship and piloting. 144 p. 1917. Motor Boating, \$1.

*Scientific American*, May 12, 1917, p.478. ½ col.

"This excellent handbook appears at a most opportune time and leaves the yachtsman no excuse for ignorance in any situation that may arise."

**Chemical engineering catalog. 288 p. 1916. Chemical Catalog Co.**

*India rubber world*, May 1, 1917, p.462. ¼ col.

"Intended to supersede a large mass of printed matter issued by individual manufacturers and is classified and indexed so that it furnishes in a small compass a large amount of information of value to chemical engineers, chemists and manufacturers in any way connected with chemical industries."

**Cheyney, Edward G.**

Scott Burton, forester. Appleton, \$1.35.

*American forestry*, May 1917, p.315. ½ col.

"Contains a wealth of authentic forestry information, in addition to being a mighty readable story."

**Chodat, R. & Vischer, W.**

La végétation du Paraguay. pt.I. 157 p. 1916. Genève.

*Botanical gazette*, May 1917, p.414. 1½ p.

"Includes investigation continued at intervals since 1889 and culminating in an expedition made in 1914...and authorized by the Federal Department of the Interior of Switzerland." *Aravilla Taylor*.

**Church, Alexander Hamilton.**

Manufacturing costs and accounts. 452 p. 1917. McGraw, \$5 net.

*Canadian engineer*, April 26, 1917, p.360. ½ col.

"Everyone interested in manufacturing administration will obtain much of value from a volume covering so complete a field, embodying the soundest practice, while remaining free from pedantic padding." *H. W. Cowan*.

*Engineering news-record*, April 19, 1917, p.150. ¾ col.

"It is the purpose of this book to present the subject of costing in such a way as to bring together the points of view of cost men and of general accountants...Intended to...meet the need of those who, familiar with the details of the factory end of cost accounting, are ready to investigate the connection between costing records and the general books of account...Sufficiently elementary in treatment to be recommended as a general textbook on accounting and cost keeping for the use of engineers." *R. R. Potter*.

*Journal of accountancy*, June 1917, p.475. 2½ p.

"Scholarly and complete treatise setting forth most of the fundamentals of cost accounting, and describing in detail the author's well known suggestion concerning supplementary rates." *Harold Dudley Greeley*.



**Claparède, Ed.**

Psychologie de l'enfant et pédagogie expérimentale. Ed.5, rev. & enl. 571 p. 1916. Fischbacher, Paris, 8 fr.

*Revue générale des sciences pures et appliquées*, Feb. 28, 1917, p.125. 1½ col.

**Claxton, William J.**

The airman and his craft. Blackie, 9d.

*Aeronautics*, April 11, 1917, p.271. ¼ col.

**Claxton, William J.**

Mastery of the air. Blackie, 2s. 6d. net.

*Aeronautics*, April 11, 1917, p.270. ¼ col.

"There is nothing in this *opus magnum* that has never been written before; there is nothing that has not over and over again been done better."

**Clements, F. E.**

Plant succession; an analysis of the development of vegetation. 512 p. 1916. The Institution. (Carnegie Institution of Washington. Publication 242.)

*Journal of forestry*, April 1917, p.479. 1 p.

"A critical analysis of the facts and principles of plant succession and a digest of methods for investigating successional phenomena...An extensive bibliography, containing nearly 1,000 titles, concludes this most complete summary of present ecological knowledge." *B. E. F.*

**Cook, Arthur L.**

Interior wiring and systems for electric light and power service. 416 p. Wiley, \$2.

*Electric journal*, May 1917, p.38. ¼ col.

"Excellent reference book for practical wiremen."

*Electric railway journal*, April 28, 1917, p.810. ¼ col.

"Intended as a guide to modern practice in electric lighting and power applications and in the design and installation of the wiring for such purposes...Also adapted for use in schools to supplement shop instruction."

*National engineer*, June 1917, p.259. ¼ col.

"One of the most thoroughly practical and comprehensive little books on this subject that has come to our attention. The author is head of the Department of Applied Electricity of Pratt Institute, and was formerly electric power engineer for Westinghouse, Church, Kerr and Co...Is especially intended...for superintendents and operators of electrical installations, and for wiremen who may be called upon to make extensions to or changes in existing installations."

**Cowee, G. Alvin.**

Practical safety methods and devices. Routledge, 12s. 6d. net.

*Electrical review*, March 16, 1917, p.297. 1 col.

"Intended to provide for employers, superintendents, underwriters, and engineers generally a convenient summary of standard safety methods and devices as developed and perfected by those who have specialized in that direction...Can be confidently recommended, and will be of value to all who study its pages."

**Crile, George W.**

A mechanistic view of war and peace. 1915. Macmillan, \$1.25.

*Saint Paul medical journal*, April 1917, p.130. ¼ col.

"After reading this book one cannot help wanting to hear more of Dr. Crile's theories of life in general and his exploration of the physiological phenomena underlying our response to our surroundings." *A. R. Colvin.*

**Croft, Terrell.**

Wiring for light and power. 426 p. 1917. McGraw, \$2.

*Building age*, May 1917, p.277. ¼ col.

"The book is an extremely comprehensive one, covering generators, motors, switch-

**Croft, Terrell—continued.**

boards, outside and inside work, wiring, sockets, fixtures, heaters, and other matters dealt with by the code."

*Electrical age*, May 1917, p.51. ¼ col.

"To supply explanation, elaboration, and illustrations for those sections of the National Electrical Code to which it is necessary to refer most frequently'... The method is to print a section of the Code and follow it by a detailed, illustrated explanation... Should be studied carefully by every beginner, since it is an excellent manual of practice in wiring."

*Power*, May 22, 1917, p.716. ½ col.

"Seems to have thoroughly covered the subject of the National Electrical Code, not only in the interpretation of the rules, but also in showing how the work should be done to conform with the regulations laid down therein... What the practical electrical man for many years past has been looking for."

**Curtis, Thomas Stanley.**

High-frequency apparatus; its construction and practical application. 245 p. 1916. Everyday Mechanics Co., \$2.

*Electric journal*, May 1917, p.38. ⅓ col.

"Discusses the theory of high frequencies, and the application of high-frequency apparatus to electrotherapeutics, to plant culture and to exhibition and vaudeville entertainments."

*Model engineer and electrician*, April 5, 1917, p.219. ⅓ col.

"The explanations are given in simple language, and the subject is treated in a superficial manner... The author deals with his subject through a considerable range of application, including the use of high-frequency apparatus for medical treatment, plant culture and stage effects."

*Scientific American supplement*, June 2, 1917, p.352. ⅓ col.

"Dispensing with the merely theoretical, the handbook speaks directly to the non-technical reader and furnishes him with designs that are the results of actual experiment and construction."

**Dean [Bashford].**

Bibliography of fishes [ed. by C. Rochester Eastman]. v.1. Am. Museum of Natural History, \$5.50.

*American naturalist*, June 1917, p.383. 2 p.

"Occupied simply by the authors' titles of papers alphabetically arranged. And only those authors have been reached whose names began with the letters A-K. A second volume is... to include the others... The index will certainly be classified in such a way as to make it reasonably easy to arrive at the papers desired... Index does not include detailed references to species, genera, or ever, in many cases, families of fishes."

**Dennett, Roger H.**

Simplified infant feeding. Lippincott, \$3.50.

*American journal of nursing*, June 1917, p.839. ½ p.

"First published in 1915, but has been reprinted several times. It is the result of years of experience in lecturing to post graduate medical students, and is exceedingly plain and practical... Nothing is seemingly omitted and the book is one for reference in any emergency connected with the feeding of young children."

**Derrick, Paul E.**

How to reduce selling costs. 228 p. 1916. Newnes, 6s. net.

*Pharmaceutical journal and pharmacist*, March 24, 1917, p.256. ⅓ col.

"British manufacturers and the general body of retailers should make a point of reading this book, which has been published at an opportune moment."

**Despaux, A.**

Qu'est-ce que l'électricité? Qu'est-ce que le magnétisme? Dunod & Pinat, Paris, 7 fr. 50.

*Le Génie civil*, April 21, 1917, p.268. 6 l.

**Dicksee, Lawrence R.**

Office machinery. Gee, 6s. net.

*Iron and coal trades review*, April 13, 1917, p.419. ⅓ col.

"Very instructive 'handbook for progressive office managers' on a new subject, namely, that of devices and appliances for assisting the human element in the office."

**Diels, H.**

Antike technik. 140 p. 1914. Teubner, Leipzig.

*American anthropologist*, Jan.-March 1917, p.71. 4½ p.

"The author's six lectures deal with science and technics among the Greeks; antique doors and locks; steam-engine, automaton, and taxameter; ancient telegraphy; ancient artillery; and ancient chemistry." *B. Laufer*.

**Dilworth, Edward C.**

Steel railway bridges; designs and weights. 185 p. Van Nostrand, \$4 net.

*Engineering news-record*, April 19, 1917, p.152. 1⅓ col.

"As a whole, the book presents, in its collection of practical designs, its extensive data on proportioning and detailing and other features, a valuable work for the instruction and reference of those who will not be misled by its rather numerous errors and inadequacies." *A. W. Carpenter*.

**Domeratzky, L.**

Commercial travelers in Latin America. 42 p. U. S. Government, \$10.

*India rubber world*, May 1, 1917, p.461. ¼ col.

"This pamphlet, which is No. 35 of the Tariff Series, published by the Bureau of Foreign and Domestic Commerce, Department of Commerce, is certainly a valuable compilation of facts which are absolutely necessary to be known by all business houses that contemplate extending their trade to Latin America by personal representatives."

**Dommett, W. E.**

Aeroplanes and airships. Ed.3. 106 p. Whittaker, 1s. 3d. net, paper; 2s. net, cloth.

*Engineering review*, Feb. 15, 1917, p.250. ½ col.

"Contains a very interesting account of the various types of aeroplanes and airships ... Printed in very clear type and has very good illustrations."

**Dubosc, André.**

Les cholesterols au point de vue scientifique et industriel. 102 p. Author, Paris, 26 fr.

*India rubber world*, June 1, 1917, p.529. 9 l.

"Collection of articles and experiments concerning cholesterols, which originally appeared in... 'Le Caoutchouc & la Gutta-Percha.'"

**Duff, A. Wilmer, ed.**

Text-book of physics. Ed.4, rev. 692 p. 1916. Churchill, 10s. 6d. net.

*Nature*, March 15, 1917, p.41. ⅓ col.

"The only criticism of the volume we have to make is that some of the illustrations ... are scarcely worthy of the text."

**Dumont, E.**

Théorie générale des nombres. 93 p. 1916. Gauthier-Villars, Paris, 2 fr.

*Bulletin of the American Mathematical Society*, May 1917, p.370. 2½ p.

"A very clear account of the fundamental notions of number." *James Byrnie Shaw*.

**Dunkley, W. G.**

Design of machine elements. 2v. v.1, 206 p.; v.2, 215 p. Scott, Greenwood, \$1.50 each.

*American machinist*, May 17, 1917, p.880. ¼ col.

"No attempt is made to present any new material, but the books cover in small space the generally accepted application of the laws of mechanics to the elementary parts of machines... The presentation, in all cases, is clear and concise, and such as to be of value to both students of machine design and to practicing engineers."



**Durand, W. F.**

Practical marine engineering, for marine engineers and students; ed.4, rev. and enl. by C. W. Dyson. 982 p. Marine Engineering, \$6.

*Engineering news-record*, April 19, 1917, p.153. ¼ col.

"First edition... was written by Prof. W. F. Durand 'for the operative or practical marine engineer'... A second and then a third part were subsequently added. In the present edition Captain Dyson has combined the three independent parts into a consecutive whole, besides adding new material."

*International marine engineering*, April 1917, p.190. 1¼ col.

"Those parts of the original book dealing with the fundamental principles of marine machinery have been retained, but the order of treatment has been changed... Much new material has been added in order to bring the book thoroughly up to date."

*Journal of the American Society of Naval Engineers*, May 1917, p.412. ½ p.

"The excellent treatise of Professor W. F. Durand which gave such a large amount of useful information on those parts of the general field of Engineering which are of especial interest to the practical marine engineer has been brought up to date."

**Durell, Fletcher.**

Fundamental sources of efficiency. 368 p. 1914. Lippincott, 10s. 6d. net.

*Bulletin of the American Mathematical Society*, May 1917, p.381. 1¼ p.

"We have not—at least not all of us—read a book such as that under review, in which are summarized and analyzed into a few elemental principles the various forms and sources of efficiency. It is written so the general reader may enjoy its pages."

*Ernest W. Ponzer.*

*Science progress*, April 1917, p.691. 1 p.

"In war, in teaching, in commerce, in industry, in social amelioration, in thinking itself, methods are overhauled, tested, criticised, and discussed... Dr. Fletcher Durell endeavors to outline a complete Science, or Philosophy, of efficiency." *Joshua C. Gregory.*

**Dyke, A. L.**

Dyke's automobile encyclopedia. Ed.5. 825 p. Author, St. Louis.

*Municipal engineering*, June 1917, p.320. ½ col.

"Practical automobile book from which one can learn about automobiles, trucks, also engines, etc. This book is the resultant of the first practical automobile book published in America... Used by many of the aviation posts and truck divisions of the War Department, and fifty-six automobile schools, including a great number of the leading Y. M. C. A. schools from New York to San Francisco."

**Eddy, Arthur Jerome.**

The new competition. Ed.5, rev. McClurg, \$1.50.

*Inland printer*, June 1917, p.391. 1¼ col.

"That a book dealing wholly with subjects relating to business... has attained its fifth edition should be sufficient recommendation, and should commend it to all who are interested in the advance of business... In so far as the book has any merit whatsoever, it is of as much value to the laborer as to the employer, to the country mechanic and merchant as to the large corporation and trust."

**Edwards, F. W.**

Mosquitoes and their relation to disease; their life-history, habits, and control. 19 p. 1916. British Museum, 1d.

*Science progress*, April 1917, p.710. ½ p.

"Is apparently issued for the instruction of sanitary officers who have to deal with mosquitoes as carriers of disease, but is little more than a *réchauffé* of numbers of such pamphlets published during nearly twenty years in many languages." *R. R.*

**Empire municipal directory and year book.** 224 p. Sanitary Pub. Co. 5s. net.

*Practical engineer*, April 12, 1917, p.179. ¾ col.

"Information given relating to some 3500 county, borough, and other local authorities in Great Britain and Ireland and in the Overseas Dominions... Sections relating to municipal engineering in all its varied branches have been revised and brought up to date."

**England**—Advisory committee for aeronautics.

Report 19, apx.: Theory of a stream line past a curved wing, by G. Greenhill. 34 p. 1916. H. M. Stationery Office.

*Aviation and aeronautical engineering*, May 15, 1917, p.344. ½ col.

"The analysis is not sufficiently elementary to be followed by those who have not had a considerable training in mathematics and hydromechanics. The numerous figures, however, will tell a good deal to the engineer."

**Evans, A. H.**

Birds of Britain; their distribution and habits. 275 p. 1916. Cambridge, Eng.

*Science*, June 8, 1917, p.591. 1½ col.

"This concise and rather informal work is stated to be 'primarily intended for schools' but is designed also to serve as a 'short hand-book which includes the results of the most recent observations, and is adapted to modern nomenclature.'"

**Evans, George W. & Marsh, J. A.**

First year mathematics. 1916. Merrill.

*Bulletin of the American Mathematical Society*, April 1917, p.326. 2 p.

"For use in the first year of the high-school course, and is a correlation of elementary algebra, plane geometry and the fundamental ideas of coordinate and locus... So arranged as to give the pupil a clear idea of the meaning and purpose of algebra and geometry." *S. E. Slocum*.

**Fabre, Jean Henri.**

The hunting wasps; tr. by Alexandre Teixeira de Mattos. 393 p. 1916. Hodder & S., 6s. net.

*Science progress*, April 1917, p.707. ¾ p.

"The whole book is one of enthralling interest to both scientist and layman alike, and one that once begun cannot be laid aside until it is finished." *C. H. O'D.*

**Farrington, O. C.**

Meteorites; their structure, composition and terrestrial relations. 233 p. 1915. Author, Chicago, \$2.

*Revue générale des sciences pures et appliquées*, Feb. 28, 1917, p.125. ¾ col.

**Fawdry, R. C.**

Dynamics. pt.I. 177 p. 1916. G. Bell, 3s. net.

*Nature*, April 5, 1917, p.102. ⅓ col.

"Text-book of elementary dynamics, leading up to circular motion...Has points which may make it useful to a teacher who takes the theory into his own hands. The examples are well chosen and of the right standard of difficulty."

**Fay, Henry.**

Microscopic examination of steel. 18 p. Wiley, \$1.25.

*Metallurgical and chemical engineering*, May 1, 1917, p.537. ¾ col.

"Reprint of material originally published by the U. S. Ordnance Department, representing the results of investigations at the Watertown Arsenal. The text is very brief...and the photographs are very good."

**Ferguson, John Arden.**

Farm forestry. 233 p. 1916. Wiley.

*Journal of forestry*, April 1917, p.477. 1 p.

"The aim has been to bring together in available form ideas and principles already well known. In doing this he has performed a service which will be appreciated, particularly by those teaching elementary courses in forestry, in that the book will serve admirably as a text for students and also as a guide for somewhat more comprehensive lectures." *C. R. T.*

**Fernald, Robert H. & Orrok, G. A.**

Engineering of power plants. 586 p. McGraw, \$4 net.

*Engineering news-record*, May 17, 1917, p.363. ½ col.

"Of great interest to industrial-plant owners and engineers, as the treatment is both by description and discussion and introduces specific data at every turn. All kinds of power are touched on, though steam and internal-combustion plants are naturally given the most space."

**Fischer, Martin H. & Hooker, M. O.**

Fats and fatty degeneration. 146 p. Wiley, \$2.

*Journal of the American Chemical Society*, June 1917, p.1297. ¾ p.

"The modern work on colloids is applied to living cells and tissues. From the colloidal phenomena of soap and cottonseed oil and water emulsions, analogies are drawn with brains and nerves...Essentially original and refreshing." *W. R. Whitney*.

**Fish, Ada Z.**

American Red Cross textbook on home dietetics. Blakiston, \$1.

*American journal of nursing*, May 1917, p.754. ¼ p.

"Designed for general use in classes being taught, under the auspices of the Red Cross, in a course of fifteen lessons...Gives various books as references for the benefit of those wishing more extensive information."

**Fisher, W. A.**

Cataract; senile, traumatic and congenital. 1917. Chicago Eye, Ear, Nose and Throat College, \$1.50.

*Saint Paul Medical Journal*, May 1917, p.164. ½ col.

"Reviews literature dealing...more especially with the author's method of intra-capsular extraction in senile cataracts." *Paul D. Berrisford*.

**Fitch, W. H. & Smith, W. G.**

Illustrations of the British flora; a series of wood engravings, with dissections, of British plants. Ed.4, rev. 338 p. 1916. L. Reeve, 9s. net.

*Nature*, April 12, 1917, p.122. ¾ col.

**Fleming, J. A.**

Principles of electric wave telegraphy and telephony. 928 p. 1916. Longmans, \$10.

*Scientific American supplement*, June 2, 1917, p.352. ½ col.

"The selection of material has been so carefully made as to give the reader the essential and comprehensive facts in the progress and present standing of the art."

**Flinn, Alfred Douglas, and others.**

Waterworks handbook. 824 p. 1916. McGraw, \$6 net.

*American journal of public health*, April 1917, p.420. 1 p.

"Compilation of information old and new for the waterworks engineer and superintendent, the designer, constructor, operator and inspector'...A most useful and usable compilation...Divided into five parts dealing respectively with the sources, collection, transportation and delivery, distribution and character and treatment of water." *Earle B. Phelps*.

*Journal of the Western Society of Engineers*, March 1917, p.185. 1 p.

**Forbes, George.**

David Gill, man and astronomer. 418 p. 1916. Murray, 12s. net.

*Nature*, April 26, 1917, p.161. 3¾ col.

*Science progress*, April 1917, p.698. 2¾ p.

"Astronomers have to thank Prof. Forbes for writing such an excellent account of the life of one who was pre-eminent in astronomy." *H. S. J.*



**Forbush, Edward Howe.**

Natural enemies of birds. 58 p. 1916. Massachusetts State Board of Agriculture. (Economic biology. Bulletin 3.)

*Bird-lore*, March-April 1917, p.96.  $\frac{3}{4}$  col.

"Mr. Forbush shows how strictly natural enemies, and this excludes introduced species, are necessary to maintain that balance of life which prevents any one species from having an undue advantage over others and thus, in time, overrunning the country in which it lives. He does not approve, except under certain special conditions, of attempting to control the natural enemies of birds." *F. M. C.*

**Ford, Walter Burton.**

Studies on divergent series and summability. 194 p. 1916. Macmillan. (Michigan science series, v.2.)

*Bulletin of the American Mathematical Society*, April 1917, p.308.  $6\frac{1}{2}$  p.

"Presents in clear and concise fashion the fundamental features of each of the two grand divisions of divergent series, namely asymptotic series and summable series, and in certain subdivisions of each leads the reader to the present boundaries of knowledge, at the same time pointing the road to further advances." *Charles N. Moore.*

**France—Bureau des longitudes.**

Annuaire pour l'année 1916. Gauthier-Villars, Paris.

*Bulletin de la Société Internationale des Electriciens*, March 1917, p.59.  $\frac{1}{4}$  p.

**France—Bureau des longitudes.**

Annuaire pour l'an 1917. 664 p. 1917. Gauthier-Villars, Paris, 2 fr.

*Revue générale des sciences pures et appliquées*, March 15, 1917, p.153.  $\frac{1}{2}$  col.

**Franke, G.**

Handbook of briquetting; tr. by F. C. A. H. Lantsberry. 2v. v.1: Briquetting of coals, brown coals, and other fuels. 631 p. Griffin, 30s. net.

*Engineering*, May 18, 1917, p.463. (Review of v.1.) 4 col.

"If Professor Franke's account is long and at times tedious by reason of its minuteness, his survey is thorough and not uninteresting... His translator has performed his share of the work in a masterly manner."

*Engineering and mining journal*, April 21, 1917, p.725. (Review of v.1.) 10 l.

"This volume by the professor of mining, ore dressing and briquetting, in the Kgl. Bergakademie in Berlin, and translated by Lantsberry, the head of the Birmingham Small Arms Co. Laboratory deals wholly with the briquetting of pit coals and brown coals, including the preparation of wet compressed blocks. A second and shorter volume will follow soon, and will describe the briquetting of ores, metallurgical products, metal swarf and agglomeration."

*Mining magazine*, March 1917, p.175. (Review of v.1.)  $\frac{1}{2}$  col.

"This first of the two volumes deals with the briquetting of coal and other fuels... The saving of dust and fines has been carefully studied... Deals solely with German practice."

**Franklin, William Suddards, & MacNutt, Barry.**

General physics. 604 p. 1916. McGraw, \$2.75.

*Physical review*, May 1917, p.440.  $\frac{3}{4}$  p.

"No brief review of this book can do justice to it. There are here many ingenious methods of handling difficult topics, and it abounds with helpful analogies." *O. M. S.*

**Freud, Sigmund.**

Three contributions to the theory of sex; tr. by A. A. Brill. 117 p. 1916. Nervous and Mental Disease Pub. Co., \$2.

*Social hygiene*, April 1917, p.267.  $\frac{3}{4}$  p.

"With rare courage he strikes straight at factors in the child's development which psychoanalysis has found do exist and do exert this power for good or ill in later life." *S. E. J.*

**Fricke, Robert.**

Die elliptischen funktionen und ihre anwendungen. pt. I. 500 p. 1915. Teubner, Leipzig, 22 m.

*Bulletin of the American Mathematical Society*, April 1917, p.319. 3 p.

"Present volume is the first of a series of three which Dr. Fricke proposes to write on the elliptic functions and their applications... The text is free from errors... In conclusion we may express the hope that nothing will interfere with the publication of the two remaining volumes." *L. Wayland Dowling.*

**Fron, G.**

Plantes nuisibles à l'agriculture. 346 p. 1917. J. B. Baillière, Paris, 5 fr.

*Revue générale des sciences pures et appliquées*, April 30, 1917, p.252. ¾ col.

**Furman, Franklin De Ronde.**

Elementary cams. Chapman, 5s. 6d. net.

*Engineering review*, March 15, 1917, p.281. ¼ col.

"Author's object is to reduce to scientific terms the practice of the cam maker. He has succeeded... and the book should be a useful guide to loom builders, makers of spinning frames, and other mechanics." *W. S. M.*

**Fürth, Otto von.**

Problems of physiological and pathological chemistry of metabolism for students, physicians, biologists and chemists; authorized translation by Allen J. Smith. 667 p. Lippincott, 25s. net.

*Nature*, April 5, 1917, p.101. ½ col.

"On the whole it is questionable whether any real necessity existed for its translation, since there are other books in the English language which serve the purpose." *W. M. Bayliss.*

**Gager, C. Stuart.**

Fundamentals of botany. 640 p. 1916. Blakiston.

*Botanical gazette*, April 1917, p.324. 1 p.

"Guide for an introductory, cultural course for college students." *D. S. Johnson.*

**Galbraith, Anna M.**

Four epochs of woman's life; a study in hygiene. Ed.3, rev. & enl. Saunders, \$1.50.

*American journal of nursing*, June 1917, p.840. 5 l.

**Galbraith, Anna M.**

Personal hygiene and physical training for women. Ed.2. 393 p. Saunders, \$2.25.

*American journal of public health*, April 1917, p.421. ½ p.

"While it is a book of moderate size it is remarkably inclusive... Places emphasis upon posture as related to health... The chapter on Mental Hygiene is sane and helpful." *Percy G. Stiles.*

**Ganong, William F.**

Textbook of botany for colleges. pt. I: The structures and functions of plants. 401 p. 1916. Macmillan.

*Botanical gazette*, April 1917, p.323. ¾ p.

**Garrard, C. C.**

Electric switch and controlling gear. 656 p. Electrician, 15s. net.

*Electrician*, May 4, 1917, p.193. ¾ col.

"In Dr. Garrard's book we have a production which should be useful to a good many... As he is apparently... a switch-gear specialist, we should recommend that in a second edition he should deal with switch-gear only. Here he is at home, has a large personal experience, and the more he cares to tell us about it, the more useful his book will be." *R. F. Baerlocher.*

**Gear, Harry Barnes, & Williams, P. F.**

Electric central station distributing systems. Ed.2, rev. & enl. 457 p. 1917. Van Nostrand, \$3.50.

*Electric journal*, May 1917, p.38.  $\frac{1}{4}$  col.

"The original material has been revised and somewhat extended...The subject of urban transmission and high tension distribution has been made the subject of a separate chapter...Overhead and underground construction have been expanded...The discussion of diversity has been broadened and supplemented."

*Power*, May 22, 1917, p.716.  $\frac{1}{2}$  col.

"Treats of the design and construction of electrical central-station distribution systems...Representative of American practice entirely, and the treatment is based on the assumption that the reader has a general knowledge of electrical theory, such as is possessed by the more advanced students of electrical engineering and by practical distribution engineers."

**Gilbert, Arthur W. and others.**

The potato. 318 p. 1917. Macmillan.

*Science*, May 11, 1917, p.462. 1 col.

"Author states in his preface that the book is intended to give brief and practical suggestions on the growing, breeding and marketing of potatoes, and the subject-matter amply substantiates the statement...A welcome addition to our present text-books on the potato, and should find a place in the classroom of agricultural schools and colleges." *William Stuart*.

**Gilbreth, Frank Bunker, & Gilbreth, Mrs Lillian (Moller).**

Fatigue study; the elimination of humanity's greatest unnecessary waste, a first step in motion study. 159 p. 1916. Sturgis & Walton, \$1.50.

*Journal of the American Society of Mechanical Engineers*, May 1917, p.485.  $\frac{3}{4}$  col.

"Should be read by the president and directors of every industrial corporation, and copies of it should be presented to the superintendent of each department...Should be in every works library." *William Kent*.

**Gillette, Halbert Powers.**

Handbook of rock excavation; methods and cost. 830 p. Clark Bk. Co., \$5.

*Excavating engineer*, May 1917, p.310.  $\frac{1}{2}$  col.

"Contains some of the material which Mr. Gillette published about twelve years ago in a book with a similar title. The subject is greatly amplified...Not only recommended as very practical for engineers and contractors, but may be used as a text-book...Without question the most thorough and up to date [book] yet published on the subject."

**Goudie, William J.**

Steam turbines. 520 p. 1917. Longmans, 12s. 6d. net.

*International marine engineering*, May 1917, p.232.  $\frac{1}{2}$  col.

"While the book has been written primarily to suit the requirements of engineering students, it will also be found useful by engineers who have to deal with the design and operation of turbines...Deals only with the turbine proper, as the allied subjects of condensers and auxiliaries have not been touched upon."

*Iron and coal trades review*, April 13, 1917, p.419.  $\frac{1}{2}$  col.

"Excellent text-book for students, highly practical and well arranged...Numerous worked-out examples throughout the text, all of them 'educative factors of importance in a text-book.'"

*Journal of the American Society of Naval Engineers*, May 1917, p.412.  $\frac{7}{8}$  p.

"First portion of this book is devoted to detailed descriptions of commercial types of steam turbines now on the market, while the second portion is devoted to...the technical part of the subject...While written primarily to suit the requirements of engineering students, it will also be found useful by engineers who have to deal with the design and operation of turbines."



**Goursat, Edouard.**

Course in mathematical analysis. v.2, pt.1: Functions of a complex variable; tr. by E. R. Hedrick and Otto Dunkel. 259 p. 1916. Ginn.

*Bulletin of the American Mathematical Society*, May 1917, p.375. ½ p.

"Admirably adapted for use as a text in an introductory course on the theory of functions of a complex variable." *Charles N. Moore.*

**Gramont de Guiche, A. de.**

Exposé élémentaire des connaissances générales utiles aux aviateurs. 103 p. Lahure, Paris, 1 fr. 50.

*Le Génie civil*, April 7, 1917, p.236. ¼ col.

**Granjon, R. & Rosemberg, P.**

Practical manual of autogenous welding (oxy-acetylene), with a chapter on the cutting of metals with the blowpipe; tr. by D. Richardson. Ed.4. 244 p. 1916. Griffin, 5s. net.

*Chemical news*, April 20, 1917, p.191. ¼ col.

"Has been thoroughly revised and edited by translator, and additional explanations are given of some parts which were originally a little difficult to follow... A thoroughly practical guide for the welder, who will be able to learn from it all the details of his art, the best methods of manipulation, and the choice of materials and apparatus."

*Nature*, April 19, 1917, p.143. ¾ col.

"Deals with the properties and manufacture of oxygen and acetylene, and with the erection, testing, and working of welding installations; practical information is given on the composition of the metal welding rods and cleaning fluxes used, and on the preparation and execution of welds; and the autogenous welding of iron, steel, copper, brass, bronze, aluminium, and other metals and alloys is considered in detail... Contains a large number of illustrations of practical value and can be strongly recommended to all interested in the subject." *C. O. Bannister.*

**Greene, Carleton.**

Wharves and piers; their design, construction and equipment. 248 p. McGraw, \$3.

*Canadian engineer*, April 26, 1917, p.362. 1¼ col.

"The chapter on 'Fire Protection' is well worth the price of the book." *F. W. Cowie. Proceedings of the American Society of Civil Engineers*, April 1917, p.263. ½ p.

"The author... has endeavored to present a treatise on modern American practice... including machinery for handling miscellaneous freight."

*Railway age gazette*, April 27, 1917, p.877. ½ col.

"Fills a definite need for a compilation of modern practice in this special branch of structural engineering. Furthermore, the book adheres distinctly to this field throughout in that it purposely avoids repetition of general information... Instead the author refers the reader to standard works on these allied subjects... The treatment of the subject in question is most complete... An appendix on costs is also included."

**Greene, Thomas L.**

Corporation finance. 176 p. Putnam, \$1.50.

*Electric journal*, June 1917, adv. sec., p.54. ½ col.

"While the book is brief, it has compressed all the important facts in a limited space." *E. D. D.*

**Gregory, R. A.**

Discovery; or, The spirit and service of science. 340 p. 1916. Macmillan, 5s. net.

*Electrician*, April 20, 1917, p.110. ½ col.

"This eminently readable book by one who, by his writings, shows that scientific inquiry is worth while for its own sake, can be recommended to readers of every class."

*Revue générale des sciences pures et appliquées*, April 30, 1917, p.252. 1 col.

*Scientific American supplement*, June 2, 1917, p.352. ½ col.

"Object... is to promote a more sympathetic attitude toward scientists and to remove widespread misconceptions as to the meaning and influence of science... The

**Gregory, R. A.—continued.**

author brings out the high value of a direct contact with nature and an unmercenary investigation of her laws."

*Science progress*, April 1917, p.691. ½ p.

"Of all the histories ever written, those of scientific discoveries are and should be both the most useful and the most interesting...Prof. Gregory's book is a brief survey of this true history of mankind." R. R.

**Grierson, R.**

Some modern methods of ventilation. 188 p. Van Nostrand, \$3.

*Building age*, May 1917, p.277. ¼ col.

"Presents in simple and concise form the general principles and practices of design of modern ventilating plants...Prepared with special reference to public buildings."

*Electrical review (London)*, May 11, 1917, p.514. ½ col.

"We cordially welcome this book, based upon a wide experience, which should afford valuable assistance to architects and engineers responsible for the design of ventilating systems."

*Engineering review*, Feb. 15, 1917, p.250. ¾ col.

"Intended for architects and engineers who are responsible for the installation of ventilating plants rather than for students requiring an accurate knowledge of the principles of the subject...No index...Very little...on the question of cost."

**Griffith, W. St. B. & Petrie, P. T.**

Practical experiments in heat. 123 p. 1916. Rivingtons, 3s. 6d net(?).

*Nature*, March 15, 1917, p.41. ½ col.

"Intended 'for...boys between the ages of thirteen and twenty.'"

**Griffith, W. St. B. & Petrie, P. T.**

Practical experiments in light. 112 p. 1916. Rivingtons, 3s. 6d. net.

*Nature*, March 15, 1917, p.42. ½ col.

"Intended 'for...boys between the ages of thirteen and twenty.'"

**Grunsky, Carl Ewald, & Grunsky, C. E. jr.**

Valuation, depreciation and the rate-base. 387 p. Wiley, \$4 net.

*Journal of accountancy*, June 1917, p.477. 1½ p.

"Deals very comprehensively with the fundamentals of valuation and rate-making for public utilities...A good bibliography will guide the student who wishes to go deeper into the subject...Primarily intended for the engineering profession...will nevertheless be useful and instructive to accountants interested in public utilities, if only for the excellent tables showing rates of depreciation prevailing in public utilities, etc." W. H. L.

**Guerin, William.**

Protecting your factory from fire. 77 p. Pyrene Mfg. Co., N. Y., \$1.

*Construction*, March 1917, p.135. ¾ col.

"A mighty useful little book of reference...The subject has been boiled down to its most simple language."

**Hadamard, J.**

Four lectures on mathematics; delivered at Columbia University in 1911. 52 p. 1915. Columbia University Press.

*Bulletin of the American Mathematical Society*, April 1917, p.317. 1¾ p.

"By the omission of practically all technical details, Professor Hadamard has succeeded in giving a bird's-eye view of some very extensive domains of mathematics." Charles N. Moore.

**Hadley, H. E.**

Manual of practical physics. 265 p. Macmillan, 3s.

*Electrician*, April 6, 1917, p.25. ½ col.

"May be thoroughly recommended as a great assistance to those students for whom the course has been prepared." B. W. C.

**Hague, W. Grant.**

Eugenic marriage. 4v. 656 p. 1916. Review of Reviews, \$1.50.

*Social hygiene*, April 1917, p.269.  $\frac{1}{2}$  p.

"Dr. Hague has a good deal of sound advice on childbirth and the care of children, but his four volumes are so full of misstatements and loose thinking that they can not be recommended as a reliable guide." P. P.

**Harding, Louis Allen, & Willard, A. C.**

Mechanical equipment of buildings. v.1: Heating and ventilating. 606 p. 1916. Wiley, \$4 net.

*Journal of the American Society of Mechanical Engineers*, May 1917, p.484. 1 col.

"It will be of far more value in the classroom and in the hands of a technically trained engineer with the patience to digest the information contained in it, than it will be to the heating engineer that has graduated from the bench, and even the technically trained engineer seeking formulae for his work that may be easily understood and easily applied."

**Hatschek, Emil.**

Introduction to the physics and chemistry of colloids. Ed.2. 105 p. 1916. Churchill, 3s. net.

*Science progress*, April 1916, p.705.  $\frac{1}{4}$  p.

"Without doubt it has proved itself one of the best introductory volumes extant on this difficult and too little known subject." C. S. G.

**Hays, Joseph W.**

How to build up furnace efficiency. 154 p. Author, Chicago, \$1 net.

*American gas engineering journal*, June 9, 1917, p.566.  $\frac{1}{4}$  col.

"A unique combination of exceedingly flippant writing and sound common sense and valuable suggestion...Intended as a hand book of fuel economy...A useful work."

**Heath, George L.**

Analysis of copper. 220 p. McGraw, 12s. 6d.

*Mining magazine*, March 1917, p.174.  $\frac{1}{2}$  col.

"Indispensable to the libraries both of the copper producer and the analyst, for it constitutes...the first connected account of the principal approved analytical and other methods employed by the largest copper smelters, refineries, and custom-sampling works in America and Europe...Many new and special methods are given...A volume that the copper man cannot afford to be without." H. L. S.

Heaton's annual; the commercial handbook of Canada and boards of trade register. 516 p. 1917. Heaton, \$1.25.

*Scientific American*, May 26, 1917, p.533.  $\frac{1}{2}$  col.

"To all who have business relations with the Dominion this handbook offers a surprising amount of information in compact form; sound judgment is evident in the selection, and the topical arrangement and exhaustive index assure a ready answer to the inquirer."

**Henderson, William D.**

Problems in physics. 205 p. 1916. McGraw, \$1.50.

*Physical review*, May 1917, p.443.  $\frac{1}{2}$  p.

"Contains 1,025 problems...designed for engineering students who are taking a first course in university physics, but who have not yet reached the calculus stage... Will doubtless be of considerable value to those (both teachers and students) who are engaged in first-year engineering physics." W. D.

**Herschel, William J.**

Origin of finger-printing. 41 p. 1916. Humphrey Milford, \$.50.

*Scientific American supplement*, June 2, 1917, p.352.  $\frac{1}{2}$  col.

"After careful study of the claims of China and other countries as the birthplace of our present most efficient finger-print system, Sir William Herschel comes to the conclusion that he himself was the first to use such impressions for comparisons by which identity might be established. It is a very interesting story he tells."



Hess, H. D.

Graphics and structural design. 436 p. 1915. Wiley, 12s. 6d.

*Engineering*, May 11, 1917, p.457. 1½ col.

"Prepared more particularly for the use of students, but intended also to be of assistance in practical design. The title does not fully indicate the scope of its contents, as the methods used are not wholly, or even chiefly, graphical. It deals with the design of many differing classes of structures, some not usually found in text-books."

Hirschberg, Charles A.

Compressed air for metal workers. 330 p. Clark Bk. Co., \$3.

*Compressed air magazine*, May 1917, p.8378. ½ col.

"An eminently practical book, embodying precisely the information most required by users of compressed air and passing more lightly over the theories which appeal to the scientist. It deals principally with dimensions, capacities, costs of operation, etc., giving numerous tables of authoritative data."

*Iron trade review*, April 26, 1917, p.926. ¾ col.

"Classifies the entire subject under the following heads: power plants, foundries, machine shops, forge shops, boiler and structural shops and miscellany...A glossary of compressed air... and the cost of compressed air...are included in this general survey."

*Metal industry*, June 1917, p.261. ¼ col.

"We have no hesitation in recommending it most strongly to any present or prospective user of compressed air."

Hirshfeld, C. F. & Ulbricht, T. C.

Steam power. 420 p. Wiley, \$2 net.

*Boilermaker*, May 1917, p.134. ¼ col.

"The authors have endeavored to give in a brief and concise manner a working knowledge of steam power plants, including engines, boilers and auxiliaries. No attempt is made to enter deeply into the theoretical considerations of the subject involving higher mathematics."

Higgins, A. Lovat.

The slide rule; its operations and digit rules. Whittaker, 4d. net.

*Engineering review*, Jan. 15, 1917, p.208. ½ col.

Hoar, Allen.

The submarine torpedo boat; its characteristics and modern development. 211 p. 1916. Crosby Lockwood, 9s. net.

*Engineer*, May 4, 1917, p.405. 1 col.

"This little book, designed...to interest the general reader as well as the engineer, gives an impartial review of the progress of the submarine up to fairly recent times... The chapter on the design of the submarine boat will hardly be followed by the layman, but practically all the rest of the book can be...Well illustrated by photographs and diagrams."

*Engineering*, March 16, 1917, p.252. 1½ p.

"To those who have made any study of the subject of submarine navigation there is revealed little of novelty, but none the less the volume will prove of much interest and value to many who, at this time, are anxious to gain reliable information as to the design and construction of the modern submarine."

*International marine engineering*, May 1917, p.232. ½ col.

"While...written for the general reader, it is of value to technical men and engineers, as it faithfully explains the inherent characteristics of the submarine boat, the problems involved in its design and construction, the difficulties of operation and its present limitations...Useful information is given regarding the means of defense against submarine attack, and the tactical evolution of the submarine as well as the handling of torpedoes."

*Practical engineer (London)*, May 3, 1917, p.213. ¼ col.

"Author has accomplished a difficult task most creditably, he having set out to write a book which would appeal to 'the general reader,' and at the same time prove of service to technical men...Not...intended for the naval constructor...Nevertheless, there is much in the book which will appeal to naval architects and shipbuilders, for we are presented with an adequate historical introduction, a good deal of definite information on the design and construction of both submarines and submersibles and power plants."

*Proceedings of the American Society of Civil Engineers*, April 1917, p.265. ¼ p.

**Hort, W.**

Die differentialgleichungen des ingenieurs. 540 p. 1914. Springer, Berlin.

*Bulletin of the American Mathematical Society*, May 1917, p.379. 1 p.

"Cannot fail to be of interest to teachers of mathematics in American schools of engineering...A storehouse of problems with which to vitalize the subject of differential equations." *Percy F. Smith*.

**Hospitalier, Édouard, comp.**

Formulaire de l'électricien et du mécanicien; ed.28, edited by Gaston Roux. 1,400 p. 1916. Masson, Paris.

*Bulletin de la Société Internationale des Électriciens*, March 1917, p.59. ½ p.

**Hough, Benjamin Olney, comp.**

Export trade directory. 536 p. 1917. American Exporter, \$5.

*Boilermaker*, May 1917, p.134. ¼ col.

"For those who are engaged in export trade, or who contemplate entering this field for the merchandising of their products, this directory will be found of great value."

*Power*, May 1, 1917, p.610. ⅓ col.

"Has been considerably enlarged."

**How to lay-out turret lathe tools.** Alfred Herbert, Coventry, 2s. 6d. net.

*Iron and coal trades review*, May 11, 1917, p.551. 10 l.

"A guide to those who have to design tools for use on such lathes and automatic turning machines."

**Hudson, Hilda P.**

Ruler and compasses. 143 p. 1916. Longmans, \$1.80.

*Bulletin of the American Mathematical Society*, May 1917, p.377. 1 ⅞ p.

"A welcome addition to the literature on the boundary between elementary and advanced mathematics." *Virgil Snyder*.

*Science progress*, April 1917, p.697. ⅔ p.

"It is the purpose of this excellent little book to investigate, both analytically and geometrically, how far Euclidian constructions can carry us, although no attempt is made to give an account of work on transcendental numbers." *Philip E. B. Jourdain*.

**Hudson, Ralph G. and others.**

Engineers' manual. 310 p. Wiley, \$2 net.

*Electrical age*, May 1917, p.51. ¼ col.

"A compilation of useful formulas in mathematics, mechanics and engineering—civil, mechanical and electrical...Is recommended only for men who have had some technical training."

*Engineering news-record*, April 19, 1917, p.151. ½ col.

"Compilation of the formulas of engineering—civil, mechanical and electrical—together with outline mathematical operations and tables of constants. It covers the essentials of mechanics, properties of materials and structures (riveted joints, beams, structural-steel shapes, shafts, etc.), hydraulics, heat and power (including compressed air, refrigeration, steam and internal-combustion engines, heating and ventilation, etc.), electromagnetism, electric circuits and electrical machinery."

**Hungerford, Edward.**

The railroad problem. 265 p. McClurg, \$1.50.

*Railway age gazette*, June 1, 1917, p.1132. ⅓ col.

"A clear picture of the transportation question in the United States in a popular and entertaining style which is calculated to appeal to the general reading public."

**Hurley, Edward N.**

Awakening of business. 240 p. Doubleday, \$2 net.

*Metallurgical and chemical engineering*, May 1, 1917, p.537. ⅓ col.

"Parts of the book are elementary to the verge of inaninity...Other parts...are timely and thought-compelling, even though they may not always be completely convincing."

**Hursh, R. K.** See *Illinois*—Coal mining investigations.

**Hutton, F. H.**

Electricity and the motor car. Ed.2. Iliffe, 2s. 6d. net.

*Model engineer and electrician*, April 5, 1917, p.219. ⅔ col.

"Especially written for the amateur motorist...A really useful handbook which deals with the whole range of the subject, ignition, lighting and propulsion."

**Hyde, Charles Gilman, and others.**

[Report upon possible sources of water-supply for the city of Sacramento, California.] Ed.2. 660 p. Rincon, \$3 unb.; \$4 cloth.

*Engineering news-record*, May 17, 1917, p.364. ½ col.

"Contains valuable data on various phases of water-supply in general."

**Illinois**—Coal mining investigations (Coöperative agreement).

Tests on clay materials available in Illinois coal mines, by R. T. Stull & R. K. Hursh. 130 p. 1917. State Geological Survey. (Co-operative coal mining series. Bulletin 18.)

*Coal age*, April 21, 1917, p.725. 1½ col.

"A careful study, with illustrated charts, of some of the clays in Illinois coal beds...It is a pity these excellent monographs are not receiving a national circulation."

**Ingersoll, Ernest, comp.**

Index to Bird-lore, v.1-15. 46 p. 1916. National Association of Audubon Societies, N. Y., \$.50.

*Bird-lore*, March-April 1917, p.96. 12 l.

**"Ironmonger"** metal market year book for 1917. 1917. Ironmonger, 3s. 6d. net.

*Engineer*, May 11, 1917, p.421. ⅓ col.

"Contains upwards of 100 pages more than did last year's issue...The publishers...decided to make good the unavoidable hiatus in statistics and prices by extending the portion devoted to general information. Further space has also been given to Orders and Regulations bearing upon the production of and trade in metals during the war."

**Jackson, Benjamin Daydon.**

Glossary of botanic terms, with their derivation and accent. Ed.3. 427 p. 1916. Duckworth, 7s. 6d. net.

*Nature*, April 12, 1917, p.123. ¾ col.

"A new edition of Dr. Jackson's 'Glossary of Botanic Terms' is always welcome, if only for the opportunity which it gives a reviewer of expressing on behalf of botanists generally their gratitude for one of the most used and useful works of reference."

**Jeter, S. F.**

Riveted boiler joints. 155 p. 1917. McGraw, \$3 net.

*Engineering news-record*, May 17, 1917, p.361. 1½ col.

"To assist designers of boilers and those who have to do with inspecting such construction...The most important features of the book and also the most original are the boiler-joint diagrams and the discussion concerning them...Should be of particular value to those constantly employed in calculations affecting riveted joints." *Dexter S. Kimball*.

*Journal of the American Society of Mechanical Engineers*, May 1917, p.484. 1 col.

"Twofold aim of the author is to give a graphical treatment of riveted-joint design and to determine the best arrangement of rivets in a given joint...Whether this book will be of service to the designer depends entirely upon the designer's point of view."

*Alphonse A. Adler*.

*Locomotive*, April 1917, p.180. ¾ p.

"Will undoubtedly prove of service to engineers and others concerned with the design or calculation of boiler joints as a tool for constant reference...Almost indispensable to boiler and pressure vessel designers and boiler inspectors, as well as to all others having riveted work to calculate."

*National engineer*, June 1917, p.259. ¾ col.

"Author...who is chief engineer of the Hartford Steam Boiler Inspection and Insurance Co., a member of the Boiler Code Committee of the American Society of Me-



**Jeter, S. F.—continued.**

chanical Engineers... has made the designing of riveted joints one of his specialties... The main value of the book lies in the diagrams. By the use of these the joint efficiency can be determined directly, and the effect of different size of rivets, varying rivet pitch, or difference in the thickness of the plate, can be determined at a glance."

*Practical engineer (London)*, May 10, 1917, p.227. ½ col.

"Treatise on the design and failures of riveted boiler joints, but contains much that applies equally well to structural work. The author deals with methods of joint failures, types and efficiencies of joints, and then goes on to discuss strap thickness and rivet diameters, limiting pitches, making joint diagrams, closing with a most valuable chapter on riveted joint of maximum efficiency."

**John Fritz medal**; ed. by R. W. Raymond. 98 p. John Fritz Medal Board, New York, \$4.

*Engineering news-record*, April 19, 1917, p.153. ½ col.

"Contains the portraits and brief biographies of the 13 eminent engineers upon whom the John Fritz medal has been conferred."

**Johnson, J. B. and others.**

Modern framed structures. [Ed.9, rewritten.] 486 p. 1916. Wiley, \$4 net.

*Engineering-education*, May 1917, p.582. ½ p.

"An excellent book by authors who are eminent in structural design... Intended for use as a text in engineering schools, but may also be classed as a valuable reference book." *J. H. S.*

**Johnson, J. E. jr.**

Blast furnace construction in America. 415 p. McGraw, \$4 net.

*Metallurgical and chemical engineering*, June 1, 1917, p.663. ½ col.

"Probably no living person is qualified for so many different reasons to write a book on this subject... Author... uses exact and clear language, which makes the text easy reading for everyone and within the grasp of any intelligent furnace man."

**Johnson, Roswell H. & Huntley, L. G.**

Principles of oil and gas production. 371 p. 1916. Wiley.

*Economic geology*, April-May 1917, p.290. 2¼ p.

"The greatest value of the book lies in the fact that it is the first attempt to bring together the important American information about the production of oil and gas, and to publish it after critical study... References are abundant." *C. W. Washburne.*

**Johnston, A. Langstaff, jr.**

Steam piping; its economical design and correct layout. 62 p. Eng. Mag., \$2.

*Heating and ventilating magazine*, May 1917, p.57. ½ col.

"Subject matter comprises a series of articles that appeared in *Industrial Management* [Engineering magazine] during 1915, as consolidated and revised."

**Joly, J.**

Birth-time of the world, and other scientific essays. 307 p. T. F. Unwin, 10s. 6d. net.

*Science progress*, April 1917, p.692. 1½ p.

"Contains twelve essays... Some are expositions of views the scientific basis of which may be regarded as established; others are attempts to solve problems which cannot be approached by direct observation... Every essay is a model of clear and popular exposition." *J. R.*

**Jones, Edward D.**

Administration of industrial enterprises. 442 p. Longmans, \$2 net.

*Engineering news-record*, April 19, 1917, p.154. ½ col.

"Better suited for use as a textbook than as a guide to executives of industrial plants. It covers too wide a range to touch more than lightly on the vital things that make for successful management... Covers industrial administration in every phase."

**Jones, Edward Groves, & Bunce, A. H.**

Outlines of physiology. Ed.4, rev. 364 p. Blakiston, \$1.50.

*American journal of nursing*, May 1917, p.754. ¼ p.

"Notwithstanding its name this book seems a very complete presentation of an intricate subject, for the use of students and practitioners."

**Jones, F. Wood.**

Arboreal man. 230 p. 1916. Arnold, 8s. 6d.

*Revue générale des sciences pures et appliquées*, March 15, 1917, p.155. 1 col.

**Jordan, C. and others.**

Œuvres de G. H. Halphen. 1916. Gauthier-Villars, Paris, 20 fr.

*Revue générale des sciences pures et appliquées*, March 30, 1917, p.186. 2¼ col.

Devoted to algebra and geometry.

**Judge, Arthur W.**

Design of aeroplanes. 220 p. 1916. Macmillan, \$3.50.

*Scientific American*, May 12, 1917, p.478. ¼ col.

"These papers set down, from the standpoint of the mechanical engineer, the principles underlying aeroplane design together with many useful tables...A valuable compendium for the student and worker in this comparatively new field."

**Judge, Arthur W.**

High speed internal combustion engines. 350 p. 1916. Whittaker, 15s. net.

*Aeronautics*, April 11, 1917, p.270. ¼ col.

"It has been the aim of the author to collect the more valuable results of numerous experiments conducted with modern high-speed motors, and to publish these results together with a more or less exhaustive treatise of the theory of the petrol engine...A veritable mine of information to the designer who works upon scientific lines."

*Nature*, April 12, 1917, p.124. ¼ col.

"Intended to form a companion to one upon the design of high-speed internal-combustion engines...We would hesitate to recommend the book to students until the opportunity arises of examining the proposed companion volume...There are several minor blemishes."

**Judge, Arthur W.**

Properties of aerofoils and aerodynamic bodies. Whittaker, 15s. net.

*Aeronautics*, April 11, 1917, p.270. ½ col.

"By far the most valuable contribution to aeronautical literature that has appeared during the past year... Bearing in mind its acknowledged limitations, and having regard to the circumstances of the time and the class of men to whom it is designed to appeal, the book is beyond doubt one of the most valuable treatises on aerodynamical science that have yet seen the light of day."

**Junta de ciències naturals de Barcelona.**

Anuari 1916. Barcelona.

*Ibis*, April 1917, p.266. ½ p.

"This Annual is issued in connection with a new Museum recently founded at Barcelona...Papers are all written in the Catalan dialect of Spanish."

**Karapetoff, Vladimir.**

Engineering applications of higher mathematics. 5v. 1916. Wiley, \$75 each.

*Engineering review*, March 15, 1917, p.280, (review of v.2-5). 1 col.

"Each volume contains a number of exercises for the student to work—the usefulness of which would be increased if more answers were given—and a bibliography, which is in some cases inadequate."

*Nature*, April 5, 1917, p.102. ⅔ col.

"The four slender volumes...deal with hydraulics, thermodynamics, elasticity, and electricity respectively. The treatment is, on the whole, sound, though the diction is often rather loose."

*Physical review*, May 1917, p.441. 1 p.

"Apart from their regular use with a class, these little books are a valuable store-

**Karapetoff, Vladimir—continued.**

house of good problems which ought to be of service not only to teachers of engineering and of mathematical physics but perhaps even more to teachers of analytical geometry and the calculus." *H. A. B.*

**Karapetoff, Vladimir.**

Engineering applications of higher mathematics. pt.5: Problems on electrical engineering. 65 p. Chapman, 3s. net.

*Electrician*, May 11, 1917, p.231. ½ col.

"Careful examination of the contents convinces us that the merits, if there be any, are completely obscured by the deficiencies."

**Kaye, G. W. C.**

X-rays. Ed.2. 299 p. 1917. Longmans, \$3 net.

*Scientific American supplement*, June 2, 1917, p.352. ½ col.

"Addressed to the student of physics and the scientific laity... Shows thorough revision and includes original work published up to August of 1916."

**Keen, F. J.**

Aeronautical engines. Spon, 6s. net.

*Engineering review*, March 15, 1917, p.281. 1 col.

"Author has managed to give a very clear and practical description of aeronautical engines, the large number of illustrations being especially helpful to a complete understanding of the subject." *D.*

**Kempe, Harry Robert, comp.**

Engineer's year-book of formulae, rules, tables, data, &c. for 1917. 2,151 p. Crosby Lockwood, 20s. net.

*Electrician*, April 27, 1917, p.150. ½ col.

"Divided into a large number of sections, each of which constitutes a brief treatise on some aspect of engineering work. It includes references to almost every phase of such knowledge, including civil, mechanical, electrical, sanitary, marine, steam engineering, &c."

*Engineer*, April 27, 1917, p.376. ½ col.

"In actual pages there is an increase of 184, but since a certain amount of obsolete matter has been excised there are very nearly 200 pages of entirely new matter... The general result of this year's alterations and additions is that the volume has evidently been made even more useful than it was before."

*Mechanical engineer*, April 27, 1917, p.326. ½ col.

"Makes no pretence to being a pocket book; but as a work of reference it is most valuable."

**Kennelly, A. E.**

Application of hyperbolic functions to electrical engineering problems. 302 p. McGraw, \$2.50.

*Electrical age*, May 1917, p.52. ½ col.

"This volume originated in a series of lectures given for the University of London, and is the second edition of a reprint... Recently the author has published tables and charts for performing the computations outlined. By their help the methods become a most useful tool for the telephone and transmission-line specialist."

**Kent, Robert Thurston.**

Power transmission by leather belting. Chapman, 5s. 6d. net.

*Engineering review*, Jan. 15, 1917, p.208. ½ col.

"Summarises the history of the experiments on which both theory and practice are based... Should be of service to young engineers studying belt drives."

**Keyser, Cassius Jackson.**

The human worth of rigorous thinking; essays and addresses. 314 p. 1916. Columbia University Press, \$1.75.

*Bulletin of the American Mathematical Society*, April 1917, p.315. 2½ p.

"The delightful style of the author, permeated as it is with lofty sentiment... and warm feeling, makes the reading of these essays on rather abstract philosophical topics a pleasure as well as a profit. Every student of mathematics should read the book and catch the inspiration of enthusiasm for the divine science." *James Byrnie Shaw.*



**Kindelan, J.**

Handbook for track foremen, supervisors and engineers; rev. and enl. by Richard T. Dana and A. F. Trimble. 410 p. 1917. Clark Bk. Co., Inc., \$2.

*Proceedings of the American Society of Civil Engineers*, April 1917, p.263.  $\frac{1}{2}$  p.

"The book, it is said, covers the principal field of a trackman's work and keeps strictly within it; it avoids elaborate theories, its language is readily understood, and it is small enough to be carried in the pocket."

**Kinne, Helen, & Cooley, A. M.**

Food and health; an elementary textbook of home making. 312 p. 1916. Macmillan, \$65.

*Journal of home economics*, May 1917, p.242. 1 col.

"A unique and most interesting book for use in elementary schools, especially in rural communities... Will be useful in normal schools where teachers of rural schools are being trained and will also be very suggestive to any teacher of elementary food work." *Helen M. Day*.

*Nature*, March 15, 1917, p.41.  $\frac{1}{3}$  col.

"Although intended primarily for use in schools, it contains a mass of useful information for all concerned with occupations in the home." *W. M. Bayliss*.

**Kinne, Helen, & Cooley, A. M.**

The home and family. 292 p. 1917. Macmillan, \$80.

*Journal of home economics*, June 1917, p.289.  $\frac{1}{2}$  col.

"The authors of this 'elementary text book of homemaking' have used very successfully the device of giving adults much instruction and information while appearing to be working mainly to interest children. This volume is a reader to be used as a supplement with two other volumes by these authors, 'Food and Health' and 'Clothing and Health.'" *Isabel Bevier*.

**Kinney, J. P.**

Essentials of American timber law. Wiley, \$3.

*American forestry*, May 1917, p.315. 6 l.

"Devoted to a presentation of the existing law governing trees and their products as property, with such observation and references to historical development as are considered necessary to an understanding of the reasons for existing law."

**Klingenberg, G.**

Large electric power stations; their design and construction. 260 p. Crosby Lockwood, 25s. net.

*Electrician*, March 30, 1917, p.771. 1 p.

"The book is one which English engineers engaged in electricity supply on a large scale should peruse."

**Knott, Cargill Gilston, ed.**

Napier tercentenary memorial volume. 441 p. 1915. Longmans, £1, 1s.

*Bulletin of the American Mathematical Society*, May 1917, p.372. 2 $\frac{1}{8}$  p.

"Addresses and essays communicated to the International Congress held in Edinburgh in 1914 to commemorate the tercentenary of the publication of Napier's epoch-making *Mirifici Logarithmorum Canonis Descriptio*. The papers are both historical and mathematical." *David Eugene Smith*.

**Krogh, August.**

Respiratory exchange of animals and man. 173 p. 1916. Longmans.

*American journal of science*, May 1917, p.422.  $\frac{1}{2}$  p.

"The reputation of the author, reader in zoöphysiology at the University of Copenhagen, as an expert in this field of science gives adequate assurance of intelligent treatment." *L. B. M.*

**Laharpe.**

Notes et formules de l'ingénieur. Ed.18. 2v. 3,000 p. Albin Michel, Paris, 26 fr.

*Le Génie civil*, March 17, 1917, p.184.  $\frac{1}{2}$  col.

**Lakin-Smith, H.**

Printers' accounts. Gee.

*Journal of accountancy*, May 1917, p.400.  $\frac{1}{2}$  p.

"Will be of practical service to the practising accountant since it supplies that specialized data which is necessary to the best of us, however well grounded in general theory." *W. H. L.*

**Lamb, Arthur B.**

Laboratory manual of general chemistry. 166 p. 1916. Harvard University Press, \$1.45.

*Journal of physical chemistry*, May 1917, p.438. 1 p.

"A special manual for those students who have had some chemistry at one of the better high schools." *Wilder D. Bancroft.*

**Lamson, Armenhouie T.**

My birth. 190 p. 1916. Macmillan, \$1.25.

*Social hygiene*, April 1917, p.269.  $\frac{3}{4}$  p.

"The smatterings of embryology herein set forth...are harmless enough. But the language is the language of the débutante." *E. L. K. jr.*

**Lanchester, F. W.**

The flying machine from an engineering standpoint. 135 p. 1916. Constable, \$1.50.

*Aerial age weekly*, May 28, 1917, p.356.  $\frac{1}{2}$  col.

"Those who are not familiar with Mr. Lanchester's wide range of vision and unconventional treatment of aeronautical problems have undoubtedly missed much that is stimulating and suggestive."

*Canadian engineer*, May 31, 1917, p.460. 1 col.

"Revised reprint of the 1914 'James Forrest' lecture before the Institute [Institution?] of Civil Engineers, which appeared in serial form in 'Engineering' May, 1914. The work forms a brief treatment of the technical aspects of flight and the aeroplane as viewed by the aeronautical engineer and constructor, and the treatment is clear and concise...Concise and able summary...of scientific aerodynamic knowledge and the technical art of aeroplane construction at the time of the delivery of the lecture in May 1914." *J. H. Parkin.*

*Engineering*, April 6, 1917, p.313.  $2\frac{1}{2}$  col.

"Mr. Lanchester makes a highly interesting comparison between the tractive efforts needed to transport a given weight by land, water or air, and in this regard the atmosphere makes but a poor showing."

*Engineering review*, March 15, 1917, p.281.  $\frac{1}{3}$  col.

"An excellent book, and one which can be read with profit by engineers, whether they already have a knowledge of things aeronautical or not." *D.*

**Lavis, F.**

Instructions to locating engineers and field parties. 44 p. McGraw, \$1.

*Canadian engineer*, May 31, 1917, p.461.  $\frac{2}{3}$  col.

"Will become quite popular with the younger locating engineer...Instructions given for carrying on survey work are in accordance with the best up-to-date practice for large undertakings, and no doubt are intended to be varied somewhat for smaller undertakings and local conditions, that will be apparent to the man in charge." *James H. Kennedy.*

*Engineering news-record*, May 17, 1917, p.362.  $\frac{2}{3}$  col.

"Finally prepared in their present form for use in China...For the actual practical handling of the class of work referred to, no better method could be adopted and used." *M. P. Paret.*

**Lavis, F.**

Railway estimates, designs, quantities and costs. 608 p. McGraw, \$5.

*Railway and locomotive engineering*, June 1917, p.209.  $\frac{3}{4}$  col.

"F. Lavis, special lecturer on railway engineering, Yale University, presents in one volume all that is necessary in estimating the probable cost of a proposed railway, the design of the general features of a railway together with a complete analysis of details not hitherto available in any single volume."

**Lawrence, Ralph R.**

Principles of alternating current machinery. Hill, 18s. 9d. net.

*Electrical review (London)*, May 11, 1917, p.514. 1½ col.

"An excellent students' text-book...thoroughly sound and calculated to form a substantial general foundation of knowledge on which the student can develop a specialised study in any direction without feeling that he starts with only nebulous ideas lacking a definite basis. For students of electrical engineering in universities or technical colleges the work can be cordially commended."

**Leake, P. D.**

Depreciation and wasting assets. 233 p. Pitman, 10s. 6d. net.

*Colliery guardian*, March 9, 1917, p.493. ½ col.

"Mr. Leake has submitted an elaborate scheme for the measurement and recording of depreciation...A number of points are discussed briefly with special reference to coal mines."

**Lee, Roger L.**

Health and disease; their determining factors. 378 p. 1917. Little, \$1.75.

*Science*, May 11, 1917, p.463. 1 col.

"Gives a very pleasing presentation of the factors of health and disease in strictly non-technical language...It is to be most cordially recommended to the lay reader and might find a useful place as a text in a general elementary college course in hygiene and sanitation, and should certainly be on the desk of every teacher of biology and hygiene." *Curtis M. Hilliard*.

**Legros, Lucien Alphonse, & Grant, J. C.**

Typographical printing surfaces. 732 p. Longmans, \$12.50 net.

*American machinist*, June 14, 1917, p.1055. ¼ col.

"Intended for those who have to do with printing in any form...Treats of the creating of printing surfaces rather than of the impression produced...covers in concise form every subject of typography, engraving, electrotyping, die cutting, type design, casting and composing machines, etc...There is nothing left unsaid that would enlighten the layman or practical man in the fundamentals of the many subjects of the allied trades."

*Nature*, March 15, 1917, p.42. 1½ col.

"Certainly as a work of reference on its subject the book will be found most useful...The authors are deserving of praise for the careful labour they have bestowed on the compilation of this bulky and useful volume."

**Leib, David D.**

Problems in the calculus, with formulas and suggestions. 224 p. 1915. Ginn, \$1.

*Bulletin of the American Mathematical Society*, April 1917, p.322. 2 p.

"Is said to be 'the outgrowth of lists of problems prepared by the author to supplement the text-book,' and in it we find 'a supplementary list of workable problems on any topic ordinarily included in a general course in the calculus'...Many teachers will find it convenient to put in the hands of students for supplementary work." *R. W. Burgess*.

**Leith, C. K. & Mead, W. J.**

Metamorphic geology. 1915. Holt.

*Science*, April 20, 1917, p.387. 3 col.

"For advanced workers in petrology and for geologists interested in the broad problems of sedimentation and the redistribution of mineral matter in various ways." *J. P. Iddings*.

**Leman, Alfred.**

Vom periodischen dezimalbruch zur zahlentheorie. 59 p. 1916. Teubner, Leipzig. 80 pf.

*Bulletin of the American Mathematical Society*, April 1917, p.324. ¾ p.

"The aim...is to present the main properties of periodic decimals as material for a concrete introduction to the more elementary topics of the theory of numbers...Periodic fractions to bases other than 10 are treated briefly in the final chapter 8...In the notes on page 54, the statements concerning perfect numbers and the largest known prime are not up to date." *L. E. Dickson*.



**Lemarchands.**

La chimie raisonnée. 174 p. 1914. Gauthier-Villars, Paris, 5 fr. (Bibliothèque de l'élève ingénieur.)

*Journal of the American Chemical Society*, June 1917, p.1297. 9 l.

"Author practically passes by all descriptive chemistry and systematizes a few of the more important processes and rules of chemistry, but we fear the student with no previous knowledge of chemistry would be as badly off after studying this work as he would be after memorizing an ordinary descriptive chemistry. One with considerable chemical knowledge, however, will find in the book some suggestive ideas." *James Lewis Howe*.

**Lémeray, E. M.**

Le, principe de relativité. 156 p. 1916. Gauthier-Villars, Paris, 3 fr. 75.

*Revue générale des sciences pures et appliquées*, April 30, 1917, p.250. 1½ col.

**Lewis, E. R.**

Winter track work. 157 p. Railway Educational Press, \$1.60.

*Engineering news-record*, April 19, 1917, p.151. ½ col.

"Author has not stuck closely to his text. He treats incidentally of work in warm weather and hot climates, and also of the organization and equipment of track forces... Written mainly for the roadmaster and section foreman."

**Licks, H. E.**

Recreations in mathematics. 155 p. 1917. Van Nostrand, \$1.25 net.

*American journal of science*, May 1917, p.415. ½ p.

"The object of this book is to afford recreation for an idle hour and to excite the interest of young students in further mathematical inquiries'...Should be found both interesting and instructive by those to whom it is addressed." *H. S. U.*

*Scientific American supplement*, June 2, 1917, p.352. ½ col.

"A great variety of mathematical problems ranging from the logical and useful to the frivolous and absurd...It is rather to be regretted that in most cases no answers to the problems are given."

**Locomotive engineer's pocket book and diary for 1917.** 340 p. Locomotive Publishing Co., 2s. 6d.

*Model engineer and electrician*, April 5, 1917, p.219. ½ col.

*Railway and locomotive engineering*, May 1917, p.175. ½ col.

"There is no problem in connection with the construction and running and repairing of locomotives but is treated concisely and clearly in its pages."

**Loeb, Jacques.**

The organism as a whole, from a physicochemical viewpoint. 379 p. 1916. Putnam, \$2.50 net.

*Journal of physical chemistry*, May 1917, p.432. 3½ p.

*Scientific American supplement*, June 2, 1917, p.352. ½ col.

"Author's theses are well presented, and his arguments are closely wrought out to a mechanistic conclusion."

**Lotsy, J. P.**

Evolution by means of hybridization. 166 p. 1916. Nijhoff, The Hague, 6s. net.

*Nature*, March 15, 1917, p.43. 1 col.

"Will do good if it rouses any reader from the torpor of an easy orthodoxy. It may excite doubts, if it cannot allay them. The language and printing of the book make it something of a curiosity." *W. Bateson*.

**Love, Clyde E.**

Differential and integral calculus. 343 p. 1916. Macmillan. 9s. net.

*Nature*, April 5, 1917, p.102. ½ col.

"An account of the calculus from the first elements to the theory of ordinary differential equations. It includes also chapters on the applications to geometry and mechanics... Can be recommended as a good introduction to the subject, and it is doubtless intended that it should be supplemented by plentiful oral comment. The examples are of a simple character, and bear directly on the text."

**Lovelace, B. F.** See **Annual** chemical directory of the United States.

**Lunge, George.**

Coal tar and ammonia. Ed.5, enl. 3v. 1916. Gurney, £3, 3s. net.  
*Gas journal*, May 1, 1917, p.184. 1½ col.; May 8, 1917, p.229. 2¾ col.  
 (Review to be continued at a later date.)

**Lunge, George.**

Sulphuric acid and alkali. v.1: Supplement. 360 p. Gurney, 15s. net.

*Mining magazine*, May 1917, p.274. 4 l.

**Lunge, George.**

Technical chemists' handbook. Ed.2, rev. 264 p. Van Nostrand, \$3.50 net.

*American gas engineering journal*, April 21, 1917, p.398. ½ col.

"All the analytical factors have been recalculated on the basis of the atomic weights published by the International Committee for 1916. The tables of specific gravities and other tables have been selected from among the most recent and reliable determinations."

**Lyndon, Lamar.**

Hydro-electric power. 2v. Hill.

v.1. Hydraulic development and equipment. 499 p. 21s. net.

v.2. Electrical equipment and transmission. 360 p. 15s. net.

*Electrician*, May 18, 1917, p.271. 3 col.

"This excellent work treats in a concise and comprehensive manner with the whole range of hydro-electric power engineering, from the preliminary survey of the watershed to the transmission lines and sub-stations of the electrical system...The binding, printing and illustrations are excellent throughout." *J. H. Rider.*

**McCullough, Ernest.**

Engineering as a vocation. 201 p. 1912. Williams.

*Engineering-education*, May 1917, p.583. ½ p.

"Published for the information of parents in order that they may act wisely in selecting a career for their sons...An excellent guide to those in charge of any form of vocational guidance...Excellent and logically arranged and contains much pithy advice." *J. W. H.*

**McFarland, Joseph.**

Biology, general and medical. Ed.3. 475 p. 1916. Saunders, \$1.75 net.

*Scientific American supplement*, June 2, 1917, p.352. ¼ col.

"In its third edition and greatly improved form, particularly takes into account the needs of the scientific course...The general treatment is such as to make the work extremely valuable not only to the reader but slightly acquainted [with] biological science, but also to the more advanced student."

**MacMahon, Percy A.**

Combinatory analysis. v.1, 300 p.; v.2, 340 p. 1915-16. Cambridge University Press, 33s.

*Nature*, March 29, 1917, p.82, (review of v.2). 1½ col.

"It seems fair to claim...that we are indebted to the author for a new branch of mathematics, and a branch which must dominate future theories which make a prominent use of algebraical processes."

*Revue générale des sciences pures et appliquées*, March 15, 1917, p.152. 2 col.

*Science*, April 27, 1917, p.409. 4¾ col.

"A development of the algebra of symmetric functions with application to various generating expressions whose coefficients find use in enumeration problems of distribution...The whole theory of the construction of algebraic forms for certain specific purposes has been enriched here with a valuable contribution." *James Byrnie Shaw.*

*Science progress*, April 1917, p.695, (review of v.2). 2 p.

"Contains ideas which are new, and which may well prove the starting-point of future investigations." *C.*

**MacRobert, Thomas M.**

Functions of a complex variable. Macmillan, 12s. net

*Engineering*, April 6, 1917, p.314. ¼ col.

"The author has filled a want. His book is the most readable on the subject in English that we have seen; he gives graphical illustrations in plenty. The contents comprise practically all that a mathematical engineer or physicist should need."

**MacSwinney, R. F.**

Mineral duties on land values. 42 p. Sweet & Maxwell, 4s. net.

*Colliery guardian*, March 9, 1917, p.493. ½ col.

"May be described as a concise supplement to the fourth edition of the author's legal text-book on mines."

**McWane, Robert Crockett.**

Pipe and the public welfare. 165 p. Stirling Press, \$1.

*Engineering and mining journal*, April 21, 1917, p.725. 5 l.

"Four chapters dealing with the early history of pipe installations, process of manufacture of iron pipe, its deterioration and development of wood pipe. Interesting reading for those interested in pipe manufacture."

**Maddox, H. A.**

Paper; its history, sources and manufacture. Pitman, 2s. net. (Pitman's common commodities of commerce.)

*Engineering review*, Feb. 15, 1917, p.250. ¼ col.

"Well written, clear in style and accurate in statement."

**Mansfield, George.**

Small factory output and how to speed it. 64 p. McBride, Nast, 1s. 3d. net.

*Practical engineer (London)*, May 3, 1917, p.213. ½ col.

"Mr. Mansfield has written this admirable little book as the outcome of his own experience as an active member of the young aircraft industry."

**Manufacture** of artillery ammunition, by members of the editorial staff of the "American machinist," L. P. Alford, editor-in-chief. 759 p. McGraw, \$6.

*American machinist*, June 7, 1917, p.1011. ½ col.

"The authors have approached their subject in a very logical manner... As a text-book and a book of reference the authors have given the industrial men of America a valuable work." *F. W. Bowley*.

*Engineering news-record*, May 17, 1917, p.360. ½ col.

"The papers that have appeared in the *American machinist* since the onset of the European War... The material splits up into sections on shrapnel, high-explosive shells, cartridge cases and fuses. In each field the manufacturing methods are disclosed for a variety of sizes; production data are given for each kind and size of ammunition shown."

**March, Herman W. & Wolff, H. C.**

Calculus. 360 p. 1917. McGraw, \$2. (Modern mathematical texts; ed. by C. S. Slichter.)

*Bulletin of the American Mathematical Society*, May 1917, p.378. 1 p.

"Designed for a course of four hours a week throughout the college year. But it is easy to adapt it to a three hour course by suitable omissions. On the whole the book is a good one." *W. V. Lovitt*.

**Marcorettes, P.**

Les usines hydrauliques sur les cours d'eau du domaine public. 231 p. Imprimerie moderne, Toulouse.

*Le Génie civil*, April 28, 1917, p.284. ¾ col.



**Marsh, Charles Fleming, & Dunn, William.**

Manual of reinforced concrete. Ed.3. 475 p. 1916. Constable, \$3.

*Canadian engineer*, May 31, 1917, p.461. 1 col.

"Authors...have introduced much new material and incidently omitted some matter included in previous editions...Largely a compilation from a great multitude of sources, the publications of the British and American engineering organizations and the technical press of both the old world and the new being frequently quoted...Usefulness of this excellent reference book to American readers will be sensibly reduced because of the use of an unfamiliar notation." *Peter Gillespie*.

*Engineering*, May 18, 1917, p.464. 1 col.

**Marshall, Arthur.**

Explosives. v.1: History and manufacture. Ed.2, rev. 2v. 400 p. Churchill, £3, 3s. net.

*Iron and coal trades review*, April 27, 1917, p.478. 1 1/3 col.

"Owing to the more detailed treatment...the new edition of the treatise had to be expanded into two volumes. The second volume is timed to appear this spring...Great credit is due to the author for the able manner in which he has written an excellent up-to-date treatise on a difficult subject so far away from the usual gathering grounds of scientific information."

*Mining magazine*, April 1917, p.224. 2/3 col.

"The most important addition is that relating to the manufacture of the nitration products of the aromatic series, benzene, toluene, phenol, aniline, etc...In the first edition of this work these compounds did not receive much notice."

**Marshall, Charles E. ed.**

Microbiology; a text-book of microorganisms general and applied. Ed.2, rev. & enl. 900 p. 1917. Blakiston, \$3 net.

*American journal of public health*, April 1917, p.421. 3/4 p.

"The names of the collaborating authors, of whom there are twenty-five, furnish in themselves a proof of the excellency of the work...The first edition has been thoroughly revised and rearranged, there are several new contributors and much new material has been added." *Francis H. Slack*.

*American journal of science*, May 1917, p.421. 1/2 p.

"Is in reality more than a text-book; it is a reliable and authoritative summary of the entire knowledge of the microorganisms of economic importance. It is the combined effort of many specialists." *W. R. C.*

**Martin, Geoffrey.**

Industrial and manufacturing chemistry. v.1: Inorganic. 500 p. Crosby Lockwood, 25s. net.

*Mining magazine*, April 1917, p.224. 1/3 col.

"A condensed encyclopedia or extended dictionary of inorganic industrial chemistry, and as such constitutes an excellent index of the applications and treatments of mineral products."

**Mathews, Gregory M.**

Birds of Australia. v.6, pt.1-2. pt.1, 104 p.; pt.2, 111 p. 1917. Withby.

*Ibis*, April 1917, p.253. 2 p.

**Mavor, James.**

Government telephones; the experience of Manitoba, Canada. 176 p. Moffat, \$1 net.

*Electric railway journal*, May 5, 1917, p.856. 11 l.

"Relates in detail the fatal weaknesses of government ownership as illustrated by the experience of the Province of Manitoba with telephones...Seems to be a careful attempt to uncover the facts of an interesting experiment, and as such is a valuable contribution to the general discussion on government ownership."

*Engineering news-record*, May 17, 1917, p.361. 1/2 col.

"Starts with the purchase of the Bell system by the province in 1907 and comes down to 1914, when the author visited Manitoba for the purpose of his study...Although notably one-sided, the general impression created by the book is that, measured by business standards, government telephones in Manitoba were a failure."

**Mead, Daniel W.**

Contracts, specifications, and engineering relations. 535 p. McGraw, \$3 net.

*Engineering news-record*, May 17, 1917, p.364.  $\frac{2}{3}$  col.

"A complete outline of professional conduct in engineering relations from hunting a 'job' to drawing a contract... So far as the subject of contract writing is concerned, the book is to be preferred to any work published in recent years."

**Meade, Alwyne.**

Modern gas works practice. 540 p. 1916. Van Nostrand, \$7.50.

*Gas age*, June 1, 1917, p.561.  $\frac{1}{3}$  col.

"A general work of reference dealing with modern gas engineering practice... Author states that nearly every chapter was submitted to an expert in each particular branch for suggestions."

**Mechanical world electrical pocket-book for 1917.** 240 p. Norman, Remington, \$.45.

*Electric railway journal*, April 28, 1917, p.810.  $\frac{1}{4}$  col.

"In this year's handbook a lengthy section on electrical measurements and testing has been added. Other new sections include those on transmission line calculations and on wiring systems... Written in a concise practical manner."

**Mechanical world pocket diary and year book for 1917.** [Ed.30.] 330 p. Norman, Remington, \$.35.

*International marine engineering*, May 1917, p.232. 7 l.

"Many sections of the book have been thoroughly revised and much new information has been added."

*Journal of the Franklin Institute*, June 1917, p.795.  $\frac{1}{3}$  p.

"In this relatively small space a very large amount of data of the kind required by the machine designer has been condensed... Brought up to date by the addition of a section of the heat treatment of steel and a number of new tables. British standards predominate." *Lucien E. Picolet*.

**Meek, Alexander.**

Migrations of fish. 427 p. 1916. Arnold, 16s. net.

*Nature*, March 29, 1917, p.81.  $1\frac{1}{2}$  p.

"Notwithstanding what we have criticized as faults of commission or omission in this substantial work, it is one which no one interested in fishery science or desirous of an up-to-date grasp of some of the phenomena underlying practical fishery questions can afford to overlook."

*Science progress*, April 1917, p.705.  $\frac{7}{8}$  p.

"A large amount of material has been gathered together from many original sources and is here rendered available to the general reader for the first time... The first attempt to deal with the subject in an exhaustive way in English." *C. H. O'D.*

**Merrifield, W. V.**

Tidal soundings and diagrams. 31 p. 1916. Longmans, \$.50 net.

*Scientific American supplement*, June 2, 1917, p.352.  $\frac{1}{4}$  col.

"Useful instruction in three brief chapters."

**Metal statistics [ed.10]; ed. by C. S. Trench & B. E. V. Luty.** 1917. American Metal Market Co.

*Iron and coal trades review*, April 13, 1917, p.419. 9 l.

"Tenth annual edition of this useful guide for buyers and sellers of both ferrous and non-ferrous metals in the American market."

**Meyer, E. B.**

Underground transmission and distribution. 312 p. 1916. McGraw, \$3.

*Electrical age*, May 1917, p.51.  $\frac{1}{4}$  col.

"An admirable résumé... Recommended especially to those who desire a general knowledge of the subject, such as operating employees, and managers of the smaller companies who must supervise their own underground plant."

**Meyers, G. J.**

Steam turbines. U. S. Naval Inst.

*Sibley journal of engineering*, June 1917, p.212. ½ col.

"To all interested in the steam turbine, especially in its construction and operation, this book will be found to be most helpful." *C. A. P.*

**Michigan Agricultural College**—Laboratory of bacteriology, hygiene and pathology.

Laboratory manual in general microbiology. 418 p. 1916. Chapman, 10s. 6d net.

*Science progress*, April 1917, p.709. ¾ p.

"Will prove of considerable value to laboratory workers, and will certainly serve to make the worker more independent of his teacher." *J. M. Beattie.*

**Miessner, B. F.**

Radiodynamics. 206 p. Van Nostrand, \$2 net.

*Aviation and aeronautical engineering*, May 15, 1917, p.344. ⅓ col.

"Gives a comprehensive review of the art of the wireless control of torpedoes up-to-date... Should be interesting to students of aeronautics, as control of torpedoes both submarine and aerial for airplanes is not far removed."

**Miller, C. W.**

Oxy-acetylene welding. 287 p. 1916. Industrial Press, \$2.50.

*Journal of the American Society of Mechanical Engineers*, May 1917, p.486. 1½ col.

"Practically confined to repair work. There is a field for such a book as this, and while it may not be perfect, nothing better of its kind has yet been brought out to the best knowledge of the reviewer." *Henry B. Cobleigh.*

**Miller, Dayton Clarence.**

Science of musical sounds. 286 p. 1916. Macmillan, \$2.50.

*Journal of physical chemistry*, April 1917, p.338. 4½ p.

"Development of a series of eight lectures on 'Sound Analysis' delivered at the Lowell Institute in January and February, 1914... The chief scientific value of the book consists of course in the exposition of the quantitative details in regard to musical sounds." *Wilder D. Bancroft.*

**Mills, Clifford Newton.**

Elementary mechanics for engineers. 127 p. Van Nostrand, \$1 net.

*Canadian engineer*, April 26, 1917, p.363. ⅓ col.

"Written in as simple a manner as possible so as to meet the needs of younger students... But the reader would have to understand trigonometry, as an acquaintance with it is assumed and formulae involving it are used." *Robert W. Angus.*

**Montessus de Ballore, R. de.**

Leçons sur les fonctions elliptiques en vue de leurs applications.

267 p. 1917. Gauthier-Villars, Paris, 12 fr.

*Revue générale des sciences pures et appliquées*, April 15, 1917, p.217. 1½ col.

**Montgrand, L. de.**

Automobiles, camions et tracteurs; principes et utilisation. 222 p.

1917. Berger-Levrault, Paris, 7 fr. 50.

*Le Génie civil*, March 17, 1917, p.184. ½ col.

*Revue générale des sciences pures et appliquées*, April 15, 1917, p.217. 1 col.

**Morley, Arthur.**

Mechanics for engineers. Ed.4. 1914. Longmans, 4s. net.

*Aeronautics*, April 11, 1917, p.270. ¼ col.

"An ideal text-book, the scope of which is adequately—for once—indicated by its title. It is lucid, sound, thoroughly reliable, and can be thoroughly recommended (a rare combination) both to the beginner and to the accomplished aeronautical engineers. The fourth edition has been considerably improved by condensation and additions."



**Moses, Alfred J. & Parsons, C. L.**

Elements of mineralogy; crystallography and blowpipe analysis from a practical standpoint. Ed.5, enl. & rewritten. 631 p. Van Nostrand, \$3.

*American journal of science*, May 1917, p.420.  $\frac{1}{3}$  p.

"Changes in this edition...have involved the addition of almost two hundred pages...The book covers a very wide field and its method of treatment is necessarily very concise. At times one is inclined to wonder if this condensation, admirably as it is done, does not make some portions of the subject too difficult for the ordinary student." *W. E. F.*

*Engineering and mining journal*, April 21, 1917, p.725.  $\frac{1}{4}$  col.

"Description of all common and useful minerals, their formation and occurrence, tests necessary for their identification, the recognition and measurement of their crystals, and their economic importance and uses in the arts. About 200 additional pages have been included in this latest edition, the section on crystallo-optics has been enlarged, together with schemes for crushed fragments and group optical distinctions consequent upon the proved value for polarizing microscopes."

**Moullin, C. Mansell.**

Biology of tumours. 55 p. 1916. H. K. Lewis, 2s. 6d. net.

*Nature*, March 15, 1917; p.44.  $\frac{2}{3}$  col.

"Comprises the Bradshaw Lecture, somewhat extended, delivered by Mr. Mansell Moullin before the Royal College of Surgeons in 1912...Author's views...are somewhat difficult to follow, and it would have been useful had he given a brief summary at the end."

**Murray, A. J.**

Strength of ships. 400 p. 1916. Longmans, \$5 net.

*International marine engineering*, May 1917, p.232.  $\frac{1}{2}$  col.

"Increasing complexity of ship construction, the development of new designs and departures from standard arrangements and proportions are producing a growing demand for a fuller and more widespread knowledge of the strength problems underlying ship design. This book, therefore, which is claimed to be the first of its kind published in the English language, should meet such a demand...Will undoubtedly be found of practical value in many respects for ship designers."

**National Electric Light Association.**

N. E. L. A. rate book. National Electric Light Association.

*Electrical record*, May 1917, p.80.  $\frac{1}{3}$  col.

"Rates are given for light and power service used by companies in cities having a population of 40,000 and over."

**National Wholesale Druggists' Association.**

Proceedings, 42d annual meeting, Baltimore, Oct. 2-6, 1916. 654 p.

*Oil, paint and drug reporter*, May 7, 1917, p.14.  $\frac{1}{4}$  col.

"In addition to a verbatim transcript of the proceedings of this most important national association...contains all the committee reports, the special addresses, active and associate members of the association—in itself a directory of the wholesale drug trade of the country—together with a vast amount of other valuable data."

**Nernst, Walther.**

Theoretical chemistry from the standpoint of Avogadro's rule and thermodynamics; rev. in accordance with the seventh German edition by H. T. Tizard. Ed.4. 853 p. 1916. Macmillan, 15s. net.

*Chemical news*, March 16, 1917, p.132.  $\frac{1}{5}$  col.

**New and nonofficial remedies, 1917. 400 p.**

*Journal of the American Pharmaceutical Association*, May 1917, p.511.  $\frac{1}{2}$  col.

"In the present edition the articles which stand accepted by the Council on Pharmacy and Chemistry of the American Medical Association are listed...The descriptions of the articles are complete and given in concise statements, so that a volume of authentic information is contained and just the kind which is needed in a reference book."

**New York (state)**—Industrial commission.

Annual report, 1915. 417 p. The State, Albany.

*India rubber world*, May 1, 1917, p.462.  $\frac{1}{3}$  col.

"Every large employer of labor in New York State will find much of interest."

**Newall, C. F.**

Problem of pain in nature. 131 p. 1917. A. Gardner, 3s. 6d. net.

*Nature*, April 5, 1917, p.103.  $\frac{1}{2}$  col.

"May be useful to those who are troubled in spirit by what they believe to be a fact: that animals in wild life suffer much pain. Mr. Newall explains in a simple way why he regards this shadow on Nature as, on the whole, of man's imagining."

**Northrup, Edwin F.**

Laws of physical science; a reference book. 210 p. 1917. Lippincott, \$2 net.

*Business philosopher*, June 1917, p.52.  $\frac{2}{3}$  p.

"A veritable *multum in parvo*. The laws of physical science are classified under the heads of Mechanics, Hydrostatics, etc., Sound, Heat and Physical Chemistry, Electricity and Magnetism, and Light...As a reference work it is invaluable, containing within the compass of a pocket size book information which hitherto has been widely scattered and practically inaccessible to the layman."

*Journal of the Franklin Institute*, June 1917, p.793.  $\frac{3}{4}$  p.

"Doctor Northrup has done a needed piece of work very well indeed. He has given the physicist a good additional tool, and every one having to do with physics, closely or remotely, should keep this book near to his elbow." *George F. Stradling*.

**Nottage, W. H.**

Calculation and measurement of inductance and capacity. Wireless Press, 2s. 6d.

*Electrical review (London)*, May 11, 1917, p.515. 1 col.

"Useful summary, in a condensed and handy form, of rules and formulae for the calculation of the inductances and capacities of the various conductors used in wireless telegraphy, followed by brief descriptions of the apparatus and methods of measurement employed in the determination of these quantities."

**Oliver, Thomas.**

Occupations, from the social, hygienic and medical points of view. 110 p. 1916. Cambridge University Press, 6s.

*Revue générale des sciences pures et appliquées*, April 15, 1917, p.219.  $\frac{3}{4}$  col.

**O'Shea, & Kellogg.**

Health series of physiology and hygiene. 4v. 1915. Macmillan.

*Mind and body*, May 1917, p.146.  $\frac{1}{4}$  p.

"For...pupils in the elementary school." *Henry S. Curtis*.

**Pagé, Victor W.**

How to run an automobile. 178 p. Henley, \$1.

*Building age*, June 1917, p.336.  $\frac{1}{4}$  col.

"Intended for the man with his first car, and deals with the operating principles of modern gasoline automobiles...Text and illustrations are of such a nature that the man unfamiliar with the subject can easily grasp the principles presented."

*Coal age*, May 19, 1917, p.888.  $\frac{1}{2}$  col.

"Contains four chapters—Automobile Parts and Their Functions, General Starting and Driving Instructions, Typical 1917 Control Systems and Care of Automobiles. No less than 30 control systems now in use are described."

*Railway and locomotive engineering*, May 1917, p.175.  $\frac{1}{2}$  col.

"Treats of all the best known automobiles...All the problems possible in automobile running are solved."

**Pall, Ernest.**

Modern workshop practice; a manual for the use of engineers, apprentices, and students in technical institutes. Ed.3, rev. 362 p. Crosby Lockwood, 5s. 5d.

*Practical engineer*, April 26, 1917, p.203.  $\frac{3}{8}$  col.

"Thoroughly comprehensive manual, in which theory is subordinated to practice. There is every evidence that the revision has been carefully carried out."

**Park, Clyde William.**

Coöperative system of education. 48 p. U. S. Government, \$20. (United States—Bureau of education. Bulletin, 1916, 37.)

*Engineering news-record*, April 19, 1917, p.151.  $\frac{1}{2}$  col.

"The origin and gradual development of the Cincinnati scheme, better called the Schneider scheme, are described at some length...The pamphlet shows a syllabus of the system and of a typical course (chemistry), thus giving in tabular and graphic form the relations between objects, method, matter and mechanism of instruction in the industrial shop and the college classroom."

**Parker, Horatio Newton.**

City milk supply. 493 p. McGraw, \$5.

*Engineering news-record*, April 19, 1917, p.153.  $\frac{1}{3}$  col.

"Thoroughly up-to-date book on milk supply...written by a man who has dealt with the subject as inspector, health officer, analyst and teacher...Deals adequately with its subject and might well serve as a model for writers who have not yet learned the knack of selecting the most essential facts from a vast amount of material and presenting them in concise, orderly, instructive and readable form."

**Parsons, H. de B.**

Steam-boilers. Ed.5. 377 p. 1917. Longmans, \$4 net.

*Journal of the American Society of Mechanical Engineers*, June 1917, p.579.  $2\frac{1}{2}$  col.

"Young men will find the book very helpful, and any one interested in the subject of boilers will find it a good book to possess. In some respects...not up to date." *F. W. Dean.*

**Patterson, Austin M. comp.**

German-English dictionary for chemists. 332 p. 1917. Wiley, \$2 net.

*India rubber world*, May 1, 1917, p.461.  $\frac{1}{3}$  col.

"The need of a book of this kind has been keenly felt by all scientific men, whether well versed in the German language or otherwise...Is small enough to go in the pocket, is well bound in flexible covers, and cannot fail to be of everyday use to those who read the German scientific papers, and especially the chemical ones."

*Journal of the American Chemical Society*, June 1917, p.1296.  $\frac{1}{2}$  p.

"In the preface we read 'This book is not solely a dictionary of chemical terms. It includes words from related fields of science and, what is perhaps a novelty in a technical dictionary, a general vocabulary'...No one is better equipped for preparing such a work than Dr. Patterson...A glance at any page shows the chemical aim of the book, yet the student of physics, or mineralogy, or even medicine, will find his needs well provided for." *James Lewis Howe.*

**Payne, David W.**

Founders' manual. 676 p. Van Nostrand, \$4.

*American drop forger*, April 1917, p.131.  $\frac{1}{4}$  col.

"Special attention is given to the determination of the weight of castings and other foundry accounting and engineering."

*Metal industry*, May 1917, p.215. 9 l.

"Contains a vast wealth of information presented by data which has taken many years of actual experience to collect. The compilation of this matter, together with authoritative instructions for the solution of many problems which continually confront the metal worker, all properly arranged for ready reference, will meet with a most favorable reception by all who are interested in or connected with foundry work."



**Pearson, T. Gilbert.**

Bird study book. 258 p. 1917. Doubleday.

*Bird-lore*, May-June 1917, p.155.  $\frac{3}{4}$  col.

"Practical introduction to the study of birds, telling why and how we should learn to know them and, particularly, why we should protect them...Nowhere else will one find so satisfactory an exposition of the work for bird-protection which has been done in this country and of the varied activities of bird conservers. We regret...that the publishers have denied the book the index its contents so well deserve." *F. M. C.*

**Penman, David.**

Compressed-air practice in mining. 220 p. Griffin, 5s. net.

*Mining magazine*, April 1917, p.224.  $\frac{1}{2}$  col.

"Intended...for mining students and for engineers in practice. Its mathematics are, however, too deep for students who have had only an elementary school education, as the calculus is used...A large part of the work is taken up with the description of modern compressors, coal-cutting machines, conveyors, rock-drills, etc...The book is one that mining engineers will be glad to have on their shelves."

**Perrin, Jean.**

Atoms; authorized translation from the 4th rev. ed. by D. Ll. Hammick. 211 p. 1916. Constable, 6s. net.

*Nature*, March 15, 1917, p.44.  $\frac{3}{4}$  col.

"Mr. Hammick is to be congratulated upon the excellence of his translation...The book...is unhesitatingly recommended."

*Science progress*, April 1917, p.703.  $\frac{3}{4}$  p.

"One of the very few really indispensable books...Should be in the hands of every student of science." *W. C. M. Lewis.*

**Petherbridge, F. R.**

Fungoid and insect pests of the farm. 174 p. 1916. Cambridge University Press, 4s. net.

*Nature*, April 19, 1917, p.144.  $\frac{3}{4}$  col.

"Written for those who wish to acquire some practical knowledge of farm and garden pests. It naturally does not aim at dealing with all the numerous enemies which affect crops, but rather at giving an accurate account of some of the commoner forms. It is a pity that a great many more of the common pests were not included...The accounts also of many of the pests treated in the book are far too short." *Fred V. Theobald.*

**Petrunkevitch, Alexander.**

Morphology of invertebrate types. 263 p. 1916. Macmillan.

*American journal of science*, May 1917, p.421.  $\frac{1}{2}$  p.

"Essentially a laboratory guide to the dissection of the principal types of invertebrate animals. It differs in important respects from the other books in this field, particularly in insisting upon a more thorough and detailed study of invertebrate anatomy than has hitherto been possible for any except the most advanced students." *W. R. C.*

**Petterson, Alfred.**

Tables for computing the compensation of railway employees under the eight-hour law. Two tables. Author, Chanute, Kan., \$.25.

*Railway age gazette*, June 8, 1917, p.1179. 8 l.

"For the purpose of aiding timekeepers in computing overtime for enginemen and trainmen under the eight-hour law."

**Pharmacopœia of the United States; 9th decennial revision. 728 p. 1916. Blakiston.**

*American journal of public health*, May 1917, p.506. 1 col.

"Everything in the book has been revised...The main part of the book comprises 497 pages and contains monographs for 782 articles, including 9 general headings, 188 drugs, 265 chemicals and 320 preparations." *J. Gaub.*

**Philip, J. B.**

Nature study lessons seasonally arranged. 147 p. 1916. Cambridge University Press, 2s. 6d. net.

*Nature*, March 29, 1917, p.82.  $\frac{3}{4}$  col.

"The child of from twelve to fourteen years of age who works through its pages... will not merely have learnt to observe, but also will have gained a firm grasp of fundamental botanical principles... We cordially commend the book to all teachers of elementary botany."

**Phillips, H. B.**

Differential calculus. 162 p. 1916. Wiley, \$1.25 net.

*Canadian engineer*, April 26, 1917, p.362.  $\frac{1}{2}$  col.

"A most useful classroom text for engineering students."

**Pickering, J. C.**

Engineering analysis of a mining share. 95 p. McGraw, \$1.50.

*Engineering and mining journal*, April 21, 1917, p.725. 10 l.

"Readable and highly interesting discussion of the many factors that an engineer weighs when examining and considering a mining proposition, and it is made human... by the author's appreciation of the nontechnical training of his reader, for which class it is intended, and by his choice of popular and well-known mining shares to be analyzed for examples."

*Mining magazine*, May 1917, p.273.  $\frac{1}{2}$  col.

"We are not sure that the title of Mr. Pickering's book is quite suitable; probably some broader title embodying the idea of the commercial side of mining from the capitalist's point of view would express his aim and scope better... While not containing any novel idea or proffering any new thesis, the book is worth reading by engineers and mining directors for the author's obiter dicta. Unfortunately the book is occasionally marred by careless statements."

**Planck, Max.**

Eight lectures on theoretical physics; tr. by A. P. Wills. 130 p. Columbia University Press, \$1.

*Electrician*, April 6, 1917, p.25. 1 col.

"The author's deservedly high standing in the world of physics and mathematics make his criticisms well worth studying, and several of his suggestions will be found most helpful." *A. Russell*.

**Popovatz, Paul.**

Notions générales sur les appareils à réaction. 36 p. Gauthier-Villars, Paris.

*Nature*, April 19, 1917, p.145. 1 col.

"Deals only with considerations of the most elementary character relating to propulsion by recoil, and in particular to the action of screw or other propellers when kept fixed relative to the surrounding medium... The most useful feature appears to be that the paper can be read by a mechanic having no knowledge of mathematics and very little knowledge of dynamics."

**Porter, J. B.** See **Canada**—Mines branch. (Department of mines.)

**Pottenger, Francis Marion.**

Clinical tuberculosis. 2v. 1917. Mosby, \$12.

*Pennsylvania medical journal*, April 1917, p.524. 1 col.

"Dr. Pottenger has prepared a very complete and comprehensive treatise on pulmonary tuberculosis, in which he covers every detail of the subject." *A. A.*

**Prince, Jane.**

Letters to a young housekeeper. 168 p. 1917. Houghton, \$1.35.

*Journal of home economics*, June 1917, p.290. 1 col.

"In this group of rather personal letters to an inexperienced young bride, Jane Prince discusses some of the stumbling blocks in the path of a young housekeeper. The particular problems discussed are those which the girl who has been brought up in a well-to-do family with many servants finds when trying to fulfill her duty as the wife of a man of very moderate income." *Charlotte G. Baker*.

**Pull, Ernest.**

Modern milling. 207 p. Whittaker, 8s.

*Practical engineer*, April 26, 1917, p.203.  $\frac{1}{2}$  col.

"Describes the various types of machines, with their attachments and accessories, and the kind of work they turn out. Many useful tables are included."

**Railway year book.** Ed.20. Railway Magazine, London.

*Engineer*, May 11, 1917, p.421.  $\frac{1}{2}$  col.

"Gives one...an excellent idea of the railways of the country, its skeleton maps being specially useful in this respect...Much care has been taken in bringing the matter up to date."

**Raymond, Rossiter W.** See John Fritz medal.

**Raymond, W. R. and others, comp.**

Bibliography of scientific and technical writing. [8 p. 1917.] Iowa State College of Agriculture and Mechanic Arts.

*Engineering news-record*, April 19, 1917, p.154.  $\frac{1}{4}$  col.

"Most of the references...are to books, but some are to various articles and bulletins. Such efforts listed as have been examined and approved as to style are distinguished by asterisks, but not all the material has been examined."

**Recknagel, A. B.**

Forest working plans. Ed.2, rev. & enl. Wiley, \$2.

*American forestry*, May 1917, p.315. 9 l.

"Presents that which is best in European forest organization which is adaptable to the present methods of American forestry...Of particular value not only to the student but also to the practical forester."

**Reeve, William David, & Schorling, Raleigh.**

Review of high-school mathematics. 70 p. 1915. Univ. of Chicago Press, \$.40.

*Bulletin of the American Mathematical Society*, May 1917, p.375.  $\frac{1}{2}$  p.

"In schools in which the text-books in use do not supply sufficient review material...this manual may be found helpful." *David Eugene Smith.*

**Reid, George.**

Practical sanitation. Ed.18, rev. 367 p. 1916. Griffin, 6s. net.

*Chemical news*, April 20, 1917, p.190.  $\frac{1}{4}$  col.

"The most authoritative and widely used text-book on sanitation in the English language...The last edition has been brought up to date, and some trifling alterations have been made, although the main plan is unaltered. The Appendix on Sanitary Law has been completely revised."

**Reinhardt, Charles W.**

Lettering for draftsmen, engineers and students. Ed.14, rev. & enl. 39 p. 1917. Van Nostrand, \$1 net.

*Engineering-education*, April 1917, p.515.  $\frac{1}{2}$  p.

"Intended to give a practical system in freehand lettering for working drawings... Fourteen plates on different types of lettering, drawings and titles complete the work. The book is undoubtedly one of the best published and should be of great value to students."

*Engineering news-record*, April 19, 1917, p.153.  $\frac{1}{4}$  col.

"Present edition has been given, 'a more rounded aspect' to quote from the preface, by supplying such apparent omissions as an analysis of the Greek alphabet, methods of laying out and constructing titles and by adding some practice sheets."

**Reyes Prosper, Eduardo.**

Las estepas de España y su vegetación. 305 p. 1915. Successeurs de Rivadeneyra, Madrid.

*Revue générale des sciences pures et appliquées*, March 30, 1917, p.187.  $1\frac{1}{4}$  col.



**Richardson, O. W.**

Emission of electricity from hot bodies. 304 p. 1916. Longmans, 9s. net. (Monographs on physics.)

*Electrician*, May 11, 1917, p.228. 1½ col.

"The author is to be congratulated on the lucidity of his exposition, the completeness with which he has covered the ground, and his arrangement and choice of material from a very considerable literature. His work presents a large mass of detail connected, as far as is possible at present, by a coherent theory." *R. S. Willows*.

*Physical review*, May 1917, p.442. ¾ p.

"Should find a place in every library that claims to have an approximately complete set of works on physical science."

*Science progress*, April 1917, p.701. 1¼ p.

"Can be recommended very cordially, not merely as an account of thermionics, but for the instruction it gives in an experimental technique which requires a knowledge of almost all branches of physics for its successful development." *D. Orson Wood*.

**Ries, Heinrich.**

Economic geology. Ed.4, rewritten. 856 p. Wiley, \$4.

*Economic geology*, April-May 1917, p.286. 4 p.

"Only book on economic geology that covers the entire field of both nonmetallic and metallic deposits with descriptive matter and theory pertaining to each... Will be of great value to teacher and student alike and even where not adopted as a text-book it will certainly find extensive use as a reference volume. The large number of Canadian occurrences that have been added will give it a greater sphere of usefulness in Canada... Complete and up to date bibliographies at the end of each chapter." *Alan M. Bateman*.

**Roberts, Charles G. D.**

Hoof and claw. 291 p. 1914. Macmillan, \$1.35.

*Mind and body*, May 1917, p.145. ½ p.

"A book which every lover of our doors will appreciate... The language is so simple and the incidents so vivid that a child seven or eight years of age will enjoy them intensely, and an adult will find them no less interesting." *Henry S. Curtis*.

**Roberts, Charles G. D.**

Secret trails. 212 p. 1916. Macmillan.

*Mind and body*, May 1917, p.146. ½ p.

**Rose, Mary Schwartz.**

Feeding the family. 449 p. Macmillan, \$2.10.

*American food journal*, May 1917, p.271. ½ col.

"At the present critical juncture of affairs gastronomic, the most highly patriotic act possible to any American housewife is to purchase, read, and act upon *Feeding the Family*... It supplies in interesting simple form what every woman should know about food."

**Rowarth, E.**

Elements of engineering drawing. 131 p. Methuen, 2s. 6d. net.

*Engineering review*, March 15, 1917, p.280. 1 col.

"Especially for the use of students taking preliminary engineering courses in junior technical institutes, and has in view the teaching of how to prepare a working drawing rather than the explanation of the principles of machine design." *E. S. A.*

*Nature*, April 5, 1917, p.103. ¼ col.

"Main purpose... is to give examples of, and instructions in, the art of draughtsmanship, for the benefit of young students just entering on an elementary course of engineering... The general treatment of the subject is somewhat meagre and crude, but the plates are executed in a style that would be approved by the professional draughtsman."

**Rowland, Arthur J.**

Applied electricity for practical men. Hill, 8s. 4d.

*Electrical review (London)*, March 16, 1917, p.298. ¾ col.

"Author has succeeded in producing a book on applied electricity of undoubted usefulness, and we heartily recommend it as a text-book for trade and technical classes in electrical engineering, and as a useful handbook for all classes of electrical workers." *P. H. S. K.*

**Ruck, Karl von, & Ruck, Silvio von.**

Studies in immunization against tuberculosis. 440 p. 1916. Hoeber, \$3.50.

*Saint Paul medical journal*, April 1917, p.130. ½ col.

"Eminently practical, although the first part deals with a highly technical laboratory subject, which is, however, written for the clinician." *H. Longstreet Taylor*.

**Ruggles, Colden L'H.**

Stresses in wire-wrapped guns and in gun carriages. 259 p. 1916. Wiley, \$3.

*Journal of the American Society of Mechanical Engineers*, June 1917, p.580. 9 l.

"This work, which explains a number of the important engineering principles underlying the design of wire-wrapped guns and of gun carriages, was originally prepared for the use of the cadets of the U. S. Military Academy."

**Russel, E. S.**

Form and function; a contribution to the history of animal morphology. 383 p. 1916. Murray, 10s. 6d.

*Revue générale des sciences pures et appliquées*, April 15, 1917, p.219. ¾ col.

**Russell, Alexander.**

Treatise on the theory of alternating currents. v.2. Ed.2. 566 p. 1916. Cambridge University Press, 15s. net.

*Science progress*, April 1917, p.702. ¾ p.

"Intended for students and engineers who possess a considerable knowledge of mathematics... Altogether a notable work which should find a prominent place on the bookshelf of every electrical engineer." *D. Orson Wood*.

**Russell, Walter M.**

Operation of gas works. 209 p. McGraw, \$2 net.

*Engineering news-record*, May 17, 1917, p.364. ½ col.

"Deals with management and operation primarily and with apparatus and construction secondarily; therefore, what equipment is described is only representative."

**Sabin, A. H.**

Technology of paint and varnish. Ed.2, rev. 473 p. 1917. Wiley, \$3.50.

*Journal of physical chemistry*, May 1917, p.436. 1½ p.

"Interesting and readable book; but it is apparently very difficult for an expert to realize what the layman wants to know... 'In part the contents of this book are those things which seem most interesting or important to the writer; in part they are the things which long practical experience has shown to interest many other people.'" *Wilder D. Bancroft*.

**Sackur, Otto.**

Text-book of thermo-chemistry and thermodynamics; tr. and rev. by G. E. Gibson. 439 p. 1917. Macmillan, 12s. net.

*Chemical news*, April 20, 1917, p.191. ½ col.

"The essential facts of thermodynamics... are very clearly explained in this book. The translator has made a good many alterations in the text and is responsible for some important additions and new sections."

**Sales Service Company.**

Selling your services. 176 p. Sales Service Co., \$1 net.

*Coal age*, May 19, 1917, p.888. ½ col.

"Readable and clever, it braces up the job seeker in a work which to most of us is the weariest kind of labor."

*Electrical age*, May 1917, p.51. ½ col.

"Every man who is actively seeking a better job should read this book."

**Savage, W. G.**

Bacteriological examination of food and water. 1916. Cambridge University Press, 8s. net.

*Analyst*, April 1917, p.159. 1 p.

"Though confined within modest limits, deals in a thoroughly practical manner with the subjects within its scope...Is very clearly written, excellently arranged, and well printed and illustrated, though some of the illustrations...might well have been dispensed with. It contains numerous references to recent literature, and should prove of great value to all concerned with the subject." *C. H. Cribb*.

**Scott, Rhea Clarke.**

Home labor-saving devices. 100 p. 1916. Lippincott, \$1.

*Journal of home economics*, May 1917, p.243. ¼ col.

"Describes simply and clearly a number of useful and ingenious contrivances which any woman or girl who can use a saw and drive a nail can make...Is of convenient size and will be a useful hand-book."

**Scott, Wilfred Welday, and others, ed.**

Standard methods of chemical analysis. 864 p. Van Nostrand, \$6 net.

*American gas engineering journal*, April 21, 1917, p.398. ¼ col.

"Manual of analytical methods and general reference for the analytical chemist and for the advanced student...A thorough and complete work."

*India rubber world*, May 1, 1917, p.461. ¼ col.

"Compilation of carefully selected methods of technical analysis that have proven of practical value to the professional chemist...May well find a place in the library of the analytical chemist, where it is likely to be of frequent use."

**Scott, William Berryman.**

Theory of evolution. 183 p. 1917. Macmillan.

*Botanical gazette*, April 1917, p.325. ¼ p.

"I have seen no better presentation of this body of data for both biologist and general reader." *H. H. Newman*.

**Scovell, Clinton H.**

Cost accounting and burden application. 1916. Appleton, \$2 net.

*Journal of accountancy*, May 1917, p.399. 1 p.

"Contains little pertaining to cost accounting as a whole. Except for a few chapters at the beginning, it is concerned almost entirely with some of the problems of burden distribution...The idea most strongly emphasized...is that 'unearned burden,' or the accumulation of burden charges due to idle equipment, should not be considered manufacturing cost, although it must be recognized in the determination of proper selling prices." *Harold Dudley Greeley*.

**Scudder, Bradford A.**

Conservation of our wild birds. 71 p. 1916. Massachusetts Fish and Game Proc. Assoc., Boston.

*Bird-lore*, March-April 1917, p.95. ¾ col.

"Useful manual...Practical suggestions are given for the establishment of bird sanctuaries on which the author emphasizes the 'importance of not relaxing for a moment the campaign of extermination that must be waged against the enemies of wild life found within the borders of a sanctuary.'" *F. M. C.*

**Séjourné, Paul.**

Grandes voûtes. 6v. 1,732 p. Tardy-Pigelet, Paris, 250 fr.

*Engineering news-record*, May 17, 1917, p.358. 2 p.

"There is no other such treatise as this in existence...As a book of reference, it must certainly be invaluable to any engineer who practices at all in the line of reinforced-concrete bridge designing...Public libraries of the great centers of population where engineers congregate, and those of the universities, colleges, and technical schools where engineering is taught, should carry the work on their shelves." *J. A. L. Waddell*.



**Seward, A. C. ed.**

Science and the nation; essays by Cambridge graduates. 1917. Cambridge University Press, 5s. net.

*Iron and coal trades review*, April 13, 1917, p.419.  $\frac{1}{2}$  col.

"Each of these thirteen essays—we are told in the introduction—has been written by some one who, by life-long study and practice of the branch of science to which it relates, has qualified himself to give a just and authoritative description of the work that has already been done, as well as the bearing of that work on the present, and its promise for the future...All well written, and well worth reading."

*Nature*, April 19, 1917, p.141.  $2\frac{1}{2}$  col.

"It is the fate of many symposia to fail as a whole by the very excellence of the parts...and this unsatisfactoriness of *ensemble* is all too manifest in this well-intentioned volume...Individually the chapters are of the utmost interest to the general reader; they give him compactly and authoritatively a sound idea of the scope and value of contemporary work in chemistry, physics, botany, geology, medicine, mathematics, and anthropology." *H. G. Wells.*

**Shaw, Napier.**

The weather map; an introduction to modern meteorology. 69 p. 1916. Meteorological office, London, 4d.

*Revue générale des sciences pures et appliquées*, March 30, 1917, p.187.  $\frac{1}{2}$  col.

**Sheldon, Samuel, & Hausmann, Erich.**

Physical laboratory experiments for engineering students. 134 p. 1917. Van Nostrand, \$1.25 net.

*Engineering-education*, May 1917, p.583.  $\frac{1}{2}$  p.

"New and attractive manual, well printed, with excellent illustrations. The subjects treated are: mechanics, heat and light with one experiment on sound; thirty exercises in all with eight pages of tables of physical constants." *G. G. B.*

*Scientific American supplement*, June 2, 1917, p.352.  $\frac{1}{2}$  col.

"The thirty self-contained experiments here offered were originally prepared for sophomores of the Polytechnic Institute of Brooklyn; they are peculiarly adapted to the needs of candidates for engineering degrees."

**Shepardson, G. D.**

Telephone apparatus; an introduction to development and theory. 337 p. Appleton, \$3.

*Electrical age*, May 1917, p.52.  $\frac{1}{2}$  col.

"Throughout, the method has been descriptive, reference being made to original sources...Recommended for all who have to do with telephone equipment, from designer to wire chief."

**Sherman, Henry C.**

Food products. 594 p. Macmillan, \$2.25.

*American food journal*, May 1917, p.271.  $\frac{1}{4}$  col.

"Among dietitians this book is generally recognized as the best single work of reference extant. It is sound scientifically and technically and is both well written and illustrated."

"Shipping world" year book. Ed.1917. 1917. Shipping World, London.

*Engineer*, May 11, 1917, p.421.  $\frac{1}{2}$  col.

"In the section devoted to the Port and Harbour Directory there have been very considerable alterations in port dues and charges, &c. Moreover, the tariffs of all nations have needed and have received careful revision."

**Simon, W. & Base, Daniel.**

Manual of chemistry. Ed.11, thoroughly revised. 648 p. 1916. Lea, \$3.50 net.

*Midland druggist and pharmaceutical review*, April 1917, p.135.  $\frac{1}{2}$  p.

"Has been completely revised, brought up to date and retains its character as a book especially adapted to students of medicine, pharmacy and dentistry." *G. B. K.*

**Skinner, Walter R.**

Mining manual and mining year book for 1917. 960 p. Financial times, 15s. net.

*Colliery guardian*, April 13, 1917, p.730.  $\frac{3}{4}$  col.

"Indispensable work of reference for mining engineers, stock brokers, mine managers, bankers, mining investors, solicitors, and everyone interested in the mining industry. It contains particulars, alphabetically arranged, concerning 1,710 companies operating in all parts of the world...The dictionary, which contains 437 mining terms, is the most up-to-date, and for its scope the most complete glossary published."

*Engineering and mining journal*, April 21, 1917, p.725. 12 l.

"No important innovations...but all of the good features are continued."

*Mining magazine*, March 1917, p.176.  $\frac{1}{2}$  col.

"For thirty years...has been one of the indispensables of the City of London...It gives us the particulars of all the mining companies registered or otherwise known in England. Its accuracy is worthy of note."

**Skinner, Walter R.**

Oil and petroleum manual for 1917. 230 p. Author, London, 2s. 6d. net.

*Mining magazine*, May 1917, p.274. 8 l.

"This is the eighth yearly issue of a volume containing information relating to the oil and petroleum companies registered or known in London."

**Slocum, S. E.**

Elements of hydraulics. Ed.2. 329 p. 1917. McGraw, \$2.50.

*Canadian engineer*, April 26, 1917, p.363.  $\frac{1}{2}$  col.

"In the revised edition the author has improved the typography, numbered the paragraphs...simplified certain terms, and made important additions to the text...A valuable addition to the library shelf of the practising engineer." *Willis Chipman*.

**Smith, Alexander.**

General chemistry for colleges. Ed.2, rewritten. 662 p. 1916. Century, 6s. 6d. net.

*Chemical news*, April 20, 1917, p.191.  $\frac{1}{2}$  col.

"Has been practically rewritten, so that it may be regarded as a new work possessing, however, all the excellent features to which the earlier edition owed its success. Although suitable for students of college age and intellectual attainments, those who had no previous knowledge of chemistry would quite well be able to profit by its use."

*Journal of the American Chemical Society*, May 1917, p.1075.  $\frac{1}{2}$  p.

"The revision of the book has greatly increased its value as a text for the beginner." *James F. Norris*.

**Smith, Alexander.**

Introduction to inorganic chemistry. Ed.3, rewritten. 925 p. 1917. Century, \$2.60.

*Journal of physical chemistry*, May 1917, p.440.  $\frac{1}{2}$  p.

"Has been modified somewhat and has been brought up to date...Covers a marvelous amount of ground...Can be considered as representing one ideal of what a beginner should be taught." *Wilder D. Bancroft*.

*Journal of the American Chemical Society*, May 1917, p.1075.  $\frac{1}{2}$  p.

"The reviewer has used with success the earlier editions of the book in connection with a course in inorganic chemistry given to fourth-year college students...The new edition...will be even better adapted to this use than the earlier ones...Can be read with keen interest and clear understanding by the student who has devoted a year or more to the study of the science." *James F. Norris*.

**Smith, Alexander.**

Laboratory outline of elementary chemistry. 152 p. 1915. G. Bell, 2s. net.

*Science progress*, April 1917, p.704.  $\frac{3}{8}$  p.

"Contains a series of exercises dealing with the subject being treated in the parallel

**Smith, Alexander—continued.**

sections of the textbook [Text-book of elementary chemistry]...Much originality is shown in the substances chosen for experimentation and the methods to be employed." C. S. G.

**Smith, Alexander.**

Text-book of elementary chemistry. 457 p. 1915. G. Bell, 5s. net.

*Science progress*, April 1917, p.704.  $\frac{3}{8}$  p.

"Intended primarily for the scholar undergoing training in chemistry as a general ground-work subject without the specific intention of specialising in the subject. The author has consequently allowed himself more scope in the statement of interesting collateral facts than is usually found in elementary textbooks." C. S. G.

**Smith, Charles Marquis.**

Electric and magnetic measurements. 373 p. 1917. Macmillan, \$2.40.

*American journal of science*, May 1917, p.415.  $\frac{1}{2}$  p.

"The degree of advancement of this text may be inferred from the facts that the equivalent of one year of general physics and some knowledge of the calculus are presupposed...Because of the clearness and generality of the explanations the volume merits the serious attention of all who are engaged in conducting laboratory courses in pure as well as in applied physics." H. S. U.

*Proceedings of the American Society of Civil Engineers*, April 1917, p.264.  $\frac{1}{2}$  p.

**Smith, G. Carroll.**

What to eat and why. Ed.2, thoroughly revised. 377 p. Saunders, \$2.50 net.

*American food journal*, May 1917, p.271.  $\frac{1}{2}$  col.

"Those who are interested in the part food plays in nutrition will read this book with interest and profit...It is delightfully written; so that although addressed primarily to the medical profession, it is well adapted to the general reader."

**Smith, J. Russell.**

Elements of industrial management. Lippincott, \$2.

*Business philosopher*, May 1917, p.53.  $\frac{3}{4}$  p.

**Soddy, Frederick.**

La chimie des éléments radioactifs; tr. de l'anglais par M. E. Philippi. 174 p. 1915. Gauthier-Villars, Paris, 5 fr.

*Revue générale des sciences pures et appliquées*, March 15, 1917, p.154. 2 col.

**Spencer, Guilford Lawson.**

Handbook for cane-sugar manufacturers and their chemists. Ed.5, rewritten & enl. 529 p. 1916. Wiley, 15s. net.

*Nature*, April 26, 1917, p.162.  $\frac{3}{4}$  col.

"Is now well adapted for the use of those in charge of the large central factories which have become such a marked feature of the cane-sugar industry."

**Stacpoole, Florence.**

Advice to women on the care of the health before, during and after confinement; rev. from 5th London edition to conform to American practise by L. E. Anderson. Funk, \$1.25.

*American journal of nursing*, June 1917, p.840.  $\frac{1}{3}$  p.

"Notwithstanding that this book has been revised for American use, it seems rather old-fashioned and not what one would expect an up-to-date nurse in this country to take as a guide. It gives much good advice, and no doubt supplies a need for nurses and patients who do not have access to modern methods as all nurses in this country may have if they are wide-awake."

**Stager, H. W.**

Sylow factor table of the first twelve thousand numbers, giving the possible number of Sylow sub-groups of a group of a given order be-



**Stager, H. W.**—*continued.*

tween the limits of 0 and 12,000. 120 p. 1916. Carnegie Institution of Washington, \$4.50.

*Nature*, April 26, 1917, p.164.  $\frac{3}{4}$  col.

"The main object... is to answer the question: Given  $n$ , the order of a group, what are the possible orders of such Sylow sub-groups as it contains?... Apart from its special purpose... will be very useful to arithmeticians; every reasonable precaution seems to have been taken to make it accurate."

**Steinmetz, C. P.**

Theoretical elements of electrical engineering. Ed.4. 368 p. Hill, 12s. 6d. net.

*Electrician*, May 4, 1917, p.193.  $\frac{1}{2}$  col.

"Radically revised and practically rewritten. Everything beyond the most fundamental principles of general and special apparatus has been withdrawn in order to make room for the adequate representation of the theoretical elements of present-day electrical engineering... Characterised by almost uncanny lucidity and simplicity of expression, and is indispensable to the engineering student."

**Stewart, R. S. & Ebbels, F. C.**

Rubber companies' accounts for producing and non-producing companies. 128 p. Gee, 7s. 6d.

*India rubber world*, June 1, 1917, p.529.  $\frac{3}{4}$  col.

"Authors have made an exhaustive study of the systems of leading companies and in the light of their own extensive experience have combined the best ideas into a seemingly adequate and nearly ideal system which will tend toward more sound financial methods in the management both on estates and in company offices."

*Journal of accountancy*, June 1917, p.479.  $\frac{1}{2}$  p.

"First and important attempt to establish a standard and uniform system of accounts for a great industry which is conducted far from home, this book is recommended to the profession as a good example of 'how to do it.'" *W. H. L.*

**Stiles, Percy G.**

Human physiology; a text-book for high schools and colleges. 405 p. 1916. Saunders, 6s. 6d. net.

*Nature*, April 5, 1917, p.101. 2 col.

"Excellent attempt to provide a text-book for high schools. But, good as it is as an elementary account of the present state of physiological science, it cannot be regarded as altogether successful... Remarkably free from errors." *W. M. Bayliss.*

*Science*, May 18, 1917, p.482. 2 col.

"The announcement in the preface, the 'purpose is to present' concisely the accepted facts with only a limited description of the experiments by which these facts have been established,' gives an idea of the scope and nature of the book... The book fulfills its particular purpose better than any other with which I am familiar." *F. H. Pike.*

**Still, Alfred.**

Principles of electrical design. Hill, 12s. 6d. net.

*Electrical review*, March 16, 1917, p.297.  $\frac{5}{8}$  col.

"The ground covered includes electromagnets, direct-current dynamos and motors, and alternators... Thoroughly worth the attention of all men engaged in the design of heavy electrical machinery and of all teachers of electrical engineering."

**Stillman, Thomas B.**

Engineering chemistry. Ed.5. 760 p. 1916. Chemical, \$5.

*Journal of the American Society of Mechanical Engineers*, June 1917, p.579.  $\frac{3}{4}$  col.

"Fully up to the reputation of its ancestors and is a fit memorial to its noted author... The publication is a most valuable one and one which should be available to every chemist or engineer interested in analytical or testing work." *Charles L. Reese.*

**Stirling, Yates.**

Fundamentals of naval service. 575 p. Lippincott, \$2 net.

*Journal of the American Society of Naval Engineers*, May 1917, p.413.  $\frac{3}{8}$  p.

"An insight into the workings of all parts of every type of ship, and the functions and history of every type of ship."

**Stronck, Hubert N. & Billyard, J. R.**

Efficient purchase and utilization of mine supplies. 97 p. Wiley, \$1.25.

*Engineering and mining journal*, April 21, 1917, p.725. 6 l.

"A little book but interesting, describing a very complete system of purchase and store methods and accounts for mines of considerable size; but containing many suggestions and blanks which could well be adopted by small mines with small clerical forces."

**Stull, R. T.** See **Illinois**—Coal mining investigations.

**Tarbell, Ida M.**

New ideals in business; an account of their practice and their effects upon men and profits. Macmillan, \$1.75.

*Business philosopher*, May 1917, p.54. ¾ p.

"A most interesting and instructive presentation of the newer movements in industry, such as better working conditions for employees, improved construction of factory buildings, better homes, shorter hours, adjustment of wages, profit sharing, provision for recreation and education, and the like."

**Tashiro, Shiro.**

Chemical sign of life. 1917. Univ. of Chicago Press, \$1 net.

*Journal of physical chemistry*, April 1917, p.342. 2 p.

"There are two signs, or tests, which all living things show and which are an index of life. One of these is an electrical disturbance...The other is a chemical sign, which has just been discovered and which will be discussed in this book." *Wilder D. Bancroft*.

**Temple, Harry William.**

Practical drawing. 141 p. 1917. Heath, \$1.50 net.

*Scientific American supplement*, June 2, 1917, p.352. ½ col.

"A really artistic work by a capable teacher, containing material for a course in practical working drawing to begin in the eighth grade, with shop problems."

**Thomas, M. Edgar, & Nichols, C. E.**

Reinforced concrete design tables. 208 p. 1917. McGraw, \$3.

*Proceedings of the American Society of Civil Engineers*, April 1917, p.264. ½ p.

"Cover a wide range of stresses and include those used by a majority of designers...The tables can be applied to the design of any reinforced concrete structure and can also be used as a quick and independent check on any other set of curves or tables used by the designer."

**Thompson, F. L. & Allen, E. G.**

Town plan and the house; an opportunity for national economy. 41 p. 1917. Garden Cities and Town Planning Assoc., London, 1s. 6d. net.

*Colliery guardian*, April 20, 1917, p.767. ½ col.

"Authors have not endeavored to present an exhaustive treatise on the technical side of the subject; their intention has been to indicate the economic advantages and practicability of the methods advocated."

**Thorburn, Archibald.**

British birds. 4v. Longmans, £6, 6s. net.

*Bird-lore*, March-April 1917, p.95 (review of v.3-4). 1½ col.

"Volume IV marks the completion of this superb work...In these final volumes, the work of artist, engraver, and typographer shows no falling off...We have had no illustrations of birds published in America which would compare favorably with the plates in this work." *F. M. C.*

*Ibis*, April 1917, p.256 (review of v.4). 1 p.

"Contains the shore-birds and the sea-birds, and certainly maintains the high standard set in the previous volumes...The account of each species given in the letter press is short but to the point."

**Tilden, William A.**

Chemical discovery and invention in the twentieth century. 487 p. Dutton, 7s. 6d. net.

*Chemical news*, March 30, 1917, p.156. ½ col.

"Highly interesting account of recent work in chemistry...The needs of the student and of the general reader who is interested in the development of the science are equally considered."

*Nature*, April 12, 1917, p.121. 3½ col.

"We commend the book...to the general attention of the public. A perusal of its interesting pages will serve to dispel any lingering doubts as to the proper function of a chemist...We congratulate the author on the production of a work as useful as it is accurate and interesting...Admirably got up and excellently illustrated...a worthy and timely addition to popular chemical literature."

*Pharmaceutical journal and pharmacist*, March 24, 1917, p.256. ¾ col.

"As a popular treatise, it is admirably compiled; as a companion to textbooks it should prove of the utmost value to students of science."

**Tribot-Laspière, J.**

L'industrie de l'acier en France. 355 p. 1916. Vuibert, Paris.

*Iron and coal trades review*, May 11, 1917, p.551. ¾ col.

"Solid facts and figures are to be found throughout this excellent book, culled in quarters not generally visited by writers of text-books...Intended for a comprehensive circle of readers...The language is remarkably clear, and so simple that any part of the book can bodily be transplanted into a 'First Reader' for students of French."

*Revue générale des sciences pures et appliquées*, April 30, 1917, p.250. 2½ col.

**Turner, C. C.**

Aircraft of to-day; a popular account of the conquest of the air. 315 p. 1917. Seeley, 5s. net.

*Nature*, April 19, 1917, p.145. 2 col.

"Contrary to its title, the first quarter...is devoted to the aircraft of yesterday...The author has been very successful in an attempt to concentrate the maximum amount of information in the minimum amount of space. Every page is full of facts, yet the book is quite readable and interesting...Modern aeronautical theory and practice may be said to occupy about 130 pages...The remainder...is mainly taken up with aircraft in war."

**Twyford, H. B.**

Purchasing; its economic aspects and proper methods. 252 p. Van Nostrand, \$3 net.

*India rubber world*, May 1, 1917, p.461. ½ col.

"Many points brought out in each chapter are of sufficient value to render the book highly useful to the man who buys, whether he be in a large organization or simply running a small business."

**United States—Advisory committee for aeronautics.**

Second annual report. 630 p. U. S. Government.

*Gas engine*, May 1917, p.241. 1 p.

"Covers the...fiscal year ending June 30th, 1916...The general report of the chairman, Prof. William F. Durand...followed by technical reports...as follows: No. 8.—General specifications covering requirements of aeronautic instruments. No. 9.—Nomenclature for aeronautics. No. 10.—Mufflers for aeronautic engines. No. 11.—Gasoline carbureter design. No. 12.—Experimental researches on the resistance of air."

**United States—Federal trade commission.**

Report on the price of gasoline in 1915. 223 p. 1917. U. S. Government.

*Mining and scientific press*, May 26, 1917, p.754. ½ col.

"During the latter part of the year 1915 numerous complaints...came to the Commission, charging that the price of gasoline was unreasonably high, and that gross discriminations in price were being practised...The Commission deemed it in the public interest to make a special investigation. This report is the result of that inquiry."



**Van Lohuizen, T.**

Le phénomène de Zeeman et les séries spectrales. 33 p. (Extrait des Archives du Musée Teyler, série 3, v.2.)

*Revue générale des sciences pures et appliquées*, March 15, 1917, p.153. 1½ col.

**Venable, Francis Preston.**

Brief account of radio-activity. 54 p. Heath, \$50.

*Journal of the American Chemical Society*, June 1917, p.1297. ¾ p.

"Dr. Venable...has put in book form the lectures he has hitherto given his classes in general chemistry." *Herman Schlundt*.

*Metallurgical and chemical engineering*, May 1, 1917, p.537. ¾ col.

"Fascinating, finely written little book that can be read through in an hour. It gives the net results and conclusions of the last twenty years' study of radio-activity, the structure of the atom, and the constitution of matter."

**Visanska, Samuel A.**

Better babies; a guide to practical care of the mother and young child. Foote & Davies, \$1.50.

*American journal of nursing*, June 1917, p.839. ¾ p.

"This author spends but little time on the care of the mother, though the care of the baby is closely allied to it...All the simple ailments of childhood are presented briefly, and mothers would be helped by having the book for reference."

**Waddell, J. A. L.**

Bridge engineering. 2v. 2,177 p. Wiley, \$10.

*Wisconsin engineer*, April 1917, p.344. 1 p.

"One of the most important works on engineering which has appeared during the past year...Thoroughly scientific and rational treatise on the broad subject of bridge engineering, based on the author's extensive study and practice...Has presented in a revised form the most valuable material heretofore published, and added a great amount of new matter."

**Walker, Frank R.**

Building estimator's book. Ed.2, rev. 3,535 p(?) Author, \$5.

*Building age*, June 1917, p.336. ¾ col.

"Costs given in the work are taken from reliable sources, as in most cases the author was on the work during construction and compiled all cost data during progress of it. In other cases...from actual cost sheets...Covers the subject very thoroughly, the matters treated including estimating upon overhead expense, excavating, etc."

**Walter, Erich.**

Manual for the essence industry. 427 p. Wiley, \$4.

*American food journal*, May 1917, p.271. ¾ col.

"A particularly timely book and one which should be of interest to the brewing fraternity...Is sufficiently full to enable the brewer to reconstruct his plant in such fashion as to permit him to enter the beverage industry under most favorable circumstances."

**Waterbury, L. A.**

Stresses in structural steel angles; with special tables. 77 p. 1917. Chapman, \$1.25.

*Proceedings of the American Society of Civil Engineers*, April 1917, p.264. ½ p.

"Has been prepared with the hope that it will serve to indicate the nature of important factors affecting the stresses in steel angles, which are not commonly considered in analyses made for the purposes of design, and also that it may furnish the means for their consideration in practice."

**Waterhouse, (Frank) & Company.**

Pacific ports. 350 p. Terminal Pub. Co., \$3 net.

*American industries*, May 1917, p.42. ¼ col.

"A transportation guide and marine manual of the Pacific Ocean countries and islands, with instructions for importers and exporters and in addition is a commercial geography and commercial dictionary."

**Weaver, Erasmus M.**

Notes on military explosives. Ed.4, rev. & enl. 372 p. Wiley, \$3.25 net.

*Coal age*, May 19, 1917, p.888. 1¼ col.

"This volume, a textbook that has the great merit of simplicity, is in use at West Point. The reader who does not know much about organic chemistry and the building up of molecular structures can read this book without mystification."

*Engineering and mining journal*, April 21, 1917, p.725. ¼ col.

"Has long been the standard work on military explosives... This edition has been brought up to date and includes certain changes that have developed in connection with the European War, particularly the substitution of wood pulp for cotton in the manufacture of nitro-cellulose explosives... A chapter is devoted to military demolition, showing the proper way to destroy buildings, bridges, iron plate, masonry tunnels, stockades, railroads, etc."

*Engineering news-record*, May 17, 1917, p.360. ½ col.

"The present edition is welcome. The book shows the leading developments wrought by the present war—particularly the employment of atmospheric nitrogen and the substitution of wood pulp for cotton."

*Mining and scientific press*, May 12, 1917, p.682. ¾ col.

"Author takes advantage of the exhaustion of the third edition of his well known treatise to bring the work up to date by the inclusion of changes brought about by experience in the present European war... The whole book is so simply and plainly written that even the general public may find much profit in a study of this work." *A. H. B.*

**Wellman, Mabel Thacher.**

Food study; a textbook in home economics for high schools. 324 p. 1917. Little, \$1.

*American journal of public health*, April 1917, p.422. ½ p.

"One of the best of the recent text-books on foods for high school students. The material is clear, direct and up-to-date." *Ula M. Dow.*

**White, George F.**

Laboratory and classroom guide to qualitative chemical analysis. 171 p. 1916. Van Nostrand, \$1.25.

*Journal of physical chemistry*, May 1917, p.439. ½ p.

"In the preface the author says: 'In compiling this book, the author has endeavored continually to bear in mind the fact that the main objective of a course in qualitative analysis is the attainment of a knowledge of the fundamental principles underlying the differential behavior of elements and compounds... It is considered that this book satisfies the need of a manual for students who have completed the usual college course in general chemistry.'" *Wilder D. Bancroft.*

**Wilcox, Reynold Webb.**

Materia medica and therapeutics, including pharmacy and pharmacology. Ed.9, rev. Blakiston, \$3.50 net.

*Druggists circular*, April 1917, p.209. ¼ col.

"There is an exhaustive index which renders the information instantly accessible... Practical; compact; the subject matter is well arranged."

**Williams, Clement C.**

Design of railway location. 517 p. Wiley, \$3.50 net.

*Engineering news-record*, May 17, 1917, p.362. 1½ col.

"Excellent compilation of the essentials governing most modern theories and practices on the subject, as generally adopted by the profession... May well be in the library of every student of the subject, whether in or out of college." *M. P. Paret.*

*Railway age gazette*, May 11, 1917, p.987. ½ col.

"Intended to cover the study of the physical and economic considerations governing the location of railways, together with an exposition of the principles and methods involved in the actual location of a line... Is primarily a text for engineering schools, but is sufficiently complete in its treatment to be of value to the practicing engineer... Indicates painstaking care and wide reading on the part of the author."

**Willis, P. F.**

Practical manual on oxy-acetylene welding and cutting, with a treatise on acetylene and oxygen. 180 p. Author, St. Louis, \$50.

*Railway and locomotive engineering*, May 1917, p.175. ½ col.

"Furnishes a very complete and interesting educational course in oxy-acetylene welding and cutting. While...primarily adapted for the instruction of beginners, there is much matter that will be found useful to practised hands."

*Railway mechanical engineer*, May 1917, p.230. ¼ p.

"While written from the standpoint of the general welding shop operator, railroad shop men who are using the oxyacetylene process will find in it much information of value to them."

**Winslow, Kenelm.**

Prevention of disease; a popular treatise. 1916. Saunders, \$1.75.

*American journal of nursing*, May 1917, p.755. ½ p.

*Saint Paul medical journal*, May 1917, p.164. ½ col.

"Concise account of what has been done in prevention of disease, to date, with instructions for the preservation of health...Disease in children has a prominent part... Valuable to educators, and instructive in general welfare work...Written in simple language, technical terms being avoided as much as possible." *W. D. Beadie.*

**Woodfield, Charles L.**

Printers' arithmetic. 136 p. Chicago Typothetæ School of Printing, \$.50.

*Inland printer*, June 1917, p.391. ½ col.

"Should prove profitable reading to all young men engaged in the printing business, and especially to those whose common-school education has been neglected."

**Woods, Clinton E.**

Unified accounting methods for industrials. 484 p. Ronald, \$5.

*Engineering news-record*, May 17, 1917, p.363. ¾ col.

"Shows care and thoroughness in preparation...A book to be studied and worked with, not to be skimmed through. The fact that one does not always agree with the author does not impair the usefulness of the volume. It merely means that the reader must justify to himself that certain of his own methods, differing from those set down, are better for him than those given by the author." *Elihu Cunyningham Church.*

*India rubber world*, May 1, 1917, p.461. ½ col.

"Intended to fit into every element of an industrial or manufacturing business, of whatever size or nature...Written for the executive, the engineer and the accountant, and presents a system which would seem exceedingly efficient. Supplementing the body of the work are nearly 100 forms for statements, cards, charts, labor accounts, analysis, sheets, inventory, etc."

*Inland printer*, May 1917, p.343. 1 col.

"Two noticeable features which impress the reader from the beginning are the ease of grasping the details set forth and the completeness of the description in each method."

*National engineer*, June 1917, p.260. ¾ col.

"Prepared...for production engineers, accountants and executives, and is very comprehensive and complete. It gives the methods which he has worked out and used in handling the problems of large industrial concerns, with which he has been connected in his 20 years of experience as production engineer."

**Wynne, Walter E. & Spraragen, William.**

Handbook of engineering mathematics. 200 p. 1916. Van Nostrand, \$2 net.

*Journal of the Franklin Institute*, June 1917, p.794. ½ p.

"To satisfy the users who have had the opportunity of examining other books on engineering mathematics, the work might well be double its present volume. A bibliography might also be included. Nevertheless it contains much valuable information in just that readily available and compact form that will save both time and energy." *Lucien E. Picolet.*



**Yearbook** of the scientific and learned societies of Great Britain and Ireland. 33d annual issue. 340 p. Griffin, 7s. 6d. net.

*Engineer*, April 27, 1917, p.376.  $\frac{3}{8}$  col.

"A wonderfully complete list of the various societies of the United Kingdom."

*Mining magazine*, April 1917, p.225. 4 l.

**Young, John W. & Schwartz, A. J.**

Plane geometry. 223 p. 1915. Holt.

*Bulletin of the American Mathematical Society*, May 1917, p.376. 1 p.

"A most welcome and valuable addition to our small list of good mathematical textbooks." *M. G. Gaba*.

**Zavalla, Justo P.**

Canning of fruits and vegetables, based on the methods in use in California, with notes on the control of the micro-organisms effecting spoilage. 214 p. 1916. Chapman, 10s. 6d.

*Nature*, April 26, 1917, p.162.  $\frac{1}{2}$  col.

"Describes the processes and plant used in preserving fruits and vegetables in California, from the making of the cans to the construction of the wooden cases in which the tins of preserved fruits and vegetables are shipped... Also discusses and gives a good deal of useful information on the micro-organisms which are found in spoiled tinned goods... Useful to those engaged in this industry."

**Zimmer, George Frederick.**

Mechanical handling and storing of material. Rev. ed. 728 p. Van Nostrand, \$12.50 net.

*Coal age*, April 21, 1917, p.724.  $2\frac{1}{2}$  col.

"Wonderfully complete book, by a British engineer, on the handling and storing of material. It has recently been revised, and noticeable among the parts brought up to date are the articles on coal-face conveyors, the handling of coke from coke ovens and the handling of coal by pneumatic and hydraulic means."

*Engineering news-record*, May 17, 1917, p.364.  $\frac{2}{3}$  col.

"From the British viewpoint... The use to which the American engineer will be able to put this volume will be in the appropriating and adapting of foreign ideas. If his chief business is the designing of mechanical handling equipment, he will doubtless find the book worth the price."

## Publications of the Library now in Print

Where two prices are given, the first is that for which the publication is sold at the Library only. All prices are strictly net, except for individual publications ordered in lots of twenty or more. Remittances must be made in advance, payable to Carnegie Library of Pittsburgh. All publications not marked \* may be had free at the Library, or will be sent postpaid for 5 cents each.

### \*Classified Catalogue of the Carnegie Library of Pittsburgh.

FIRST SERIES, 1895-1902. 1907. vol. 1-3. 3,890 pp. \$12.00.

SECOND SERIES, 1902-1906. 1908. vol. 4-5. 2,020 pp. \$5.00.

THIRD SERIES, 1907-1911. 1914. vol. 6-8. 3,475 pp. \$8.00.

Bound in buckram with gilt tops. Include full author and subject indexes.

*The same* [in pamphlet form].

FIRST SERIES, 1895-1902. 10 parts. 1903-07.

Part 1. General Works. 1907. 67 pp. 10 cents, postpaid.

Part 2. Philosophy and Religion. 1903. 223 pp. Out of print.

Part 3. Sociology and Philology. 1904. 340 pp. 15 cents; postpaid, 25 cents.

Part 4. Natural Science and Useful Arts. 1904. 598 pp. 35 cents; postpaid, 50 cents.

Part 5. Fine Arts. 1905. 351 pp. 15 cents; postpaid, 25 cents.

Part 6. Literature. 1905. 308 pp. 15 cents; postpaid, 25 cents.

Part 7. Fiction. 1906. 446 pp. 25 cents; postpaid, 40 cents.

Part 8. History and Travel. 1907. 691 pp. 50 cents; postpaid, 65 cents.

Part 9. Biography. 1907. 381 pp. 20 cents; postpaid, 30 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1907. 850 pp. \$1.00; postpaid, \$1.20.

SECOND SERIES, 1902-1906. 5 parts. 1907-08.

Part 1. General Works, Philosophy, Religion, Sociology and Philology. 1907. 425 pp. Out of print.

Part 2. Natural Science, Useful Arts and Fine Arts. 1907. 477 pp. 45 cents; postpaid, 60 cents.

Part 3. Literature, English Fiction and Fiction in Foreign Languages. 1908. 342 pp. 40 cents; postpaid, 50 cents.

Part 4. History and Travel, Collected Biography and Individual Biography. 1908. 465 pp. 45 cents; postpaid, 60 cents.

Part 5. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1908. 460 pp. 80 cents; postpaid, 95 cents.

THIRD SERIES, 1907-1911. 10 parts. 1912-14.

Part 1. General Works, Philosophy, Religion. 1912. 372 pp. 40 cents; postpaid, 50 cents.

Part 2. Sociology, Philology. 1912. 418 pp. 45 cents; postpaid, 60 cents.

Part 3. Natural Science, Useful Arts. 1913. 623 pp. 60 cents; postpaid, 75 cents.

Part 4. Fine Arts. 1913. 237 pp. 25 cents; postpaid, 35 cents.

Part 5. Literature. 1913. 271 pp. 30 cents; postpaid, 40 cents.

Part 6. English Fiction, Fiction in Foreign Languages. 1913. 294 pp. 30 cents; postpaid, 40 cents.

Part 7. History and Travel. 1914. 401 pp. 40 cents; postpaid, 50 cents.

Part 8. Biography. 1914. 276 pp. 30 cents; postpaid, 40 cents.

Part 9. Books for the Blind. 1914. 44 pp. 5 cents; postpaid, 10 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1914. 816 pp. 80 cents; postpaid, \$1.00.

Monthly Bulletin. 25 cents a year, postpaid.

Not published in August and September.

Annual Reports, 1st-21st. 1897-1917. Sent free upon request.

Except the 3d, 6th and 20th, which are out of print.

Catalogue of the Carnegie Library School; a Training School for Children's Librarians. Sent free upon request.

- Periodicals and Other Serials Currently Received by the Carnegie Library of Pittsburgh.** 7th edition. 1915. 42 pp.
- Books in the Library of the American Philatelic Society.** 1910. 20 pp.
- Carnegie Institute and Library of Pittsburgh.** 1916. 32 pp.
- Gift of the German Emperor [List of Books, Maps and Photographs].** 1908. 17 pp.
- Rules for Filing Cards in the Dictionary Catalogues of the Carnegie Library of Pittsburgh.** 2d edition. 1917. 32 pp.
- What a Public Library Finds to Do; by Elisa May Willard.** 1917. 18 pp.

## Reference Lists

### History

- Books of Interest in Connection with the European War.** 1914. 26 pp.
- Braddock's Expedition.** 11 pp. (Monthly Bulletin, Nov. 1906.)
- Expedition of General Forbes against Fort Duquesne.** 1908. 20 pp.
- Expeditions of Colonel Bouquet to the Ohio Country, 1763 and 1764.** 11 pp. (Monthly Bulletin, Dec. 1909.)
- Letters of General Forbes; Reprint of 35 Letters Relating to the Expedition against Fort Duquesne.** 63 pp. 20 cents, postpaid. (Monthly Bulletin, Feb.-May 1909.)
- \*Pennsylvania; a Reading List for the Use of Schools, with Special Reference to Indian Warfare and the Local History of Pittsburgh.** 1911. 83 pp. 20 cents; postpaid, 25 cents.
- Pittsburgh in 1816.** 1916. 75 pp.
- Washington's Visits to Pittsburgh and the Ohio Country.** 15 pp. (Monthly Bulletin, Feb. 1908.)
- The Whiskey Insurrection.** 9 pp. (Monthly Bulletin, July 1906.)

### Biography

- Famous Royal Women; a Reading List for Girls.** 1908. 11 pp.
- Lives and Letters; a Selected and Annotated List.** 1910. 36 pp.
- \*Men of Science and Industry; a Guide to the Biographies of Scientists, Engineers, Inventors and Physicians, in the Carnegie Library of Pittsburgh.** 1915. 189 pp. 20 cents; postpaid, 30 cents.
- Patriots; a Reading List for Boys and Girls.** 1912. 17 pp.

### Sociology

- Housing.** 1912. 45 pp.
- Vocational Guidance.** Supplement. 10 pp. (Monthly Bulletin, Dec. 1915.)

### Debating

- \*Debate Index.** 2d edition. 1912. 84 pp. 15 cents; postpaid, 20 cents.
- Debate Index.** Supplement. 1913. 23 pp.
- Debate Index.** Second supplement. 1916. 15 pp.
- Debate Index.** Third supplement. 1917. 14 pp.

### Publications of Interest to Engineers

- Air-Brakes.** 1915. 55 pp.
- Air Conditioning.** 1914. 58 pp.
- Brick Manufacture and Bricklaying.** 26 pp. (Monthly Bulletin, Jan. 1912.)
- By-Product Coking.** 1915. 40 pp.
- Electric Driving in Rolling-Mills and Foundries.** 11 pp. (Monthly Bulletin, Nov. 1907.)
- Electric Heating and Cooking.** 1910. 16 pp.
- Engineering Ethics.** 1917. 17 pp.
- Floods and Flood Protection.** 48 pp. (Monthly Bulletin, July 1908.)
- Floods and Flood Protection.** Supplement. 1911. 19 pp.



- The Gyroscope.** 1917. 23 pp.
- Housing.** 1912. 45 pp.
- \***Index to Proceedings of the Engineers' Society of Western Pennsylvania,** Volumes 1 to 20, 1880-1904; Compiled by Harrison W. Craver. 1906. 144 pp. \$1.00 postpaid.
- \***Index to the Classified Catalogue of the Technology Department.** 2d edition. 1916. 63 pp. 10 cents.
- List of Technical Indexes and Bibliographies Appearing Serially.** 1910. 17 pp.
- \***Men of Science and Industry;** a Guide to the Biographies of Scientists, Engineers, Inventors and Physicians, in the Carnegie Library of Pittsburgh. 1915. 189 pp. 20 cents; postpaid, 30 cents.
- Metal Corrosion and Protection.** 2d edition, revised and enlarged. 58 pp. (Monthly Bulletin, July 1909.)
- Mica.** 12 pp. (Monthly Bulletin, Oct. 1908.)
- One Hundred Recent Books on Agriculture.** 1910. 19 pp.
- Refuse and Garbage Disposal.** 1909. 39 pp.
- Road Dust Preventives.** 1916. 39 pp.
- Scientific and Technical Reference Books.** 19 pp. (Monthly Bulletin, Nov. 1916.)
- \***Sewage Disposal and Treatment.** 1910. 96 pp. 15 cents, postpaid.
- Smoke Prevention.** 18 pp. (Monthly Bulletin, May 1907.)
- Sodium Nitrate Industry of Chile.** 7 pp. (Monthly Bulletin, March 1908.)
- Steam Turbines.** 21 pp. (Monthly Bulletin, Nov. 1904.)
- Technical Book Review Index.** 1917. 58 pp. 15 cents, postpaid; 50 cents a year.
- Trees and Forestry.** 1917. 18 pp.
- Water Softening.** 8 pp. (Monthly Bulletin, June 1904.)

### Library Work with Children

- \***Catalogue of Books in the Childrens Department of the Carnegie Library of Pittsburgh.** 1909. 604 pp. 75 cents; postpaid, \$1.00.
- \***Catalogue of Books, Annotated and Arranged, and Provided by the Carnegie Library of Pittsburgh for the Use of the First Eight Grades in the Pittsburgh Schools.** 1907. 331 pp. 35 cents; postpaid, 50 cents.
- \***Annotated Catalogue of Books Used in the Home Libraries and Reading Clubs.** 1905. 110 pp. 20 cents; postpaid, 25 cents.
- Illustrated Editions of Children's Books.** 1915. 20 pp.

### Story-Telling

- Stories from the Ballads of Robin Hood; Outlines for Story-Telling.** 1914. 38 pp.
- Stories from the Norse; Outlines for Story-Telling.** 1914. 22 pp.
- \***Stories to Tell to Children.** 1916. 68 pp. 25 cents.
- Story Hour Courses for Children from Greek Myths, The Iliad and The Odyssey.** 1906. 32 pp.

### Reading Lists

- Famous Royal Women; a Reading List for Girls.** 1908. 11 pp.
- "Foreign Lands Where Wonders Are."** 1911. 14 pp.
- Patriots; a Reading List for Boys and Girls.** 1912. 17 pp.
- \***Pennsylvania; a Reading List for the Use of Schools, with Special Reference to Indian Warfare and the Local History of Pittsburgh.** 1911. 83 pp. 20 cents; postpaid, 25 cents.



B6  
63

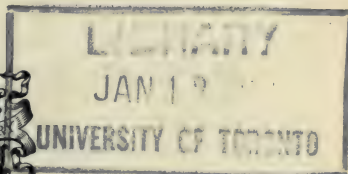
# TECHNICAL BOOK REVIEW INDEX

ISSUED BY THE TECHNOLOGY DEPARTMENT OF THE  
CARNEGIE LIBRARY OF PITTSBURGH

VOL. 1

OCTOBER 1917

No. 5



PITTSBURGH  
CARNEGIE LIBRARY  
1917





## Preface

This index, printed from part of a card-index maintained by the Carnegie Library of Pittsburgh, is a record of certain book reviews appearing in the scientific, technical and trade journals currently received in the Technology Department. It is concerned mainly with books on pure and applied science, but includes a few on allied subjects. Its purpose is primarily to *index* reviews rather than to compete with any existing booklist by suggesting books on any subject, or by furnishing bibliographic information. In accordance with this plan, the arrangement is by authors, though the form of entry, being determined from the review and not from the book itself, is in some cases doubtless incorrect.

Except for the correction of obvious errors, the bibliographic information is as given in the review, or as combined from two or more reviews when several are indexed. Since many of the reviews are carelessly done, the information given is, in many cases, both inaccurate and incomplete. In general the names of publishers are abbreviated in accordance with the practice in the more important book-trade bibliographies. Titles of journals are as a rule given in full.

Each quotation immediately follows the name of the journal from which it is taken. Obviously these brief extracts, thus detached from the context, must not be accepted as conclusive. Very often a review is so equivocal that there can be no unanimity of opinion as to whether it is favorable or unfavorable. For this reason no estimate is given here. Except for this one omission, this index is an exact copy of cards filed in the book review index of the Carnegie Library of Pittsburgh.

The "Technical Book Review Index," published in April and July 1915 by the Index Office, Inc., Chicago, consisted of a record of technical book reviews furnished by the Carnegie Library of Pittsburgh.

The Monthly Bulletin of the Carnegie Library of Pittsburgh for March, April and May included the first three issues of the Technical Book Review Index. As the number of books so reviewed is large, and as the value of such an index has been made evident by the demand for the numbers already published, it has been decided to issue it as a separate publication instead of including it in the Monthly Bulletin. It is not practicable, for this year at least, to issue it each month. The first separate issue appeared in July; the concluding number of the first volume will appear at the end of the year.

The price of the Index is fifty cents for the year, this to include the three numbers published in the Bulletin and the three separate numbers.

## Technical Book Review Index

**Agnew, Andrew N.**

Introduction to forestry for young people. Douglas & Foulis.

*American forestry*, Aug. 1917, p.504.  $\frac{1}{2}$  col.

"Issued by the Royal Scottish Arboricultural Society, written by its president, with the object of arousing an interest among children in the important subject of forestry."

**Allcock, Harry.**

Decimal system of coinage, weights and measures. Author, Radbourne Hale, Cheshire.

*Iron and coal trades review*, June 29, 1917, p.742.  $\frac{1}{2}$  col.

"Lecture delivered...last March at the Institution of Civil Engineers, Westminster, to the members of five leading technical societies."

**Allen, R. W.**

Air supply to boiler rooms of modern ships of war. 57 p. Author, Bedford [England?].

*Electrician*, July 6, 1917, p.546.  $\frac{1}{2}$  col.

"We say in very best faith, that if any of our readers have to attack the problem--consult Mr. Allen." *J. Wemyss Anderson*.

**Amar, Jules.**

Organisation physiologique du travail; préface de M. H. Le Châtelier. 374 p. 1917. Dunod & Pinat, Paris, 18 fr.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.624. 2 p.

**American Gas Institute.**

Gas chemists' handbook; comp. by Technical committee, sub-committee on chemical tests. 354 p. 1916. The Institute, \$3.50.

*Journal of the Society of Chemical Industry*, May 15, 1917, p.522.  $\frac{1}{2}$  col.

"The Committee...has for the past two years been engaged in revising the first edition of this book, compiled in 1914...Some of the methods there described have been discarded in favour of simpler and more accurate processes, and the Committee is continuing its work with a view to collecting a number of methods of analysis all of which are approved by the Institute."

**American Medical Association.**

New and non-official remedies, 1917.

*American journal of pharmacy*, Aug. 1917, p.375.  $\frac{3}{4}$  p.

"When in search of information bearing on the therapeutic activity of new drugs and preparations in the interest of his medical clientele the conservative pharmacist will do well to consult this book." *John K. Thum*.

**Andoyer, H.**

Nouvelles tables trigonométriques fondamentales, contenant les valeurs naturelles des lignes trigonométriques de centième en centième de quadrant avec 20 décimales, de neuf en neuf minutes avec 17 décimales et de 10 en 10 secondes avec 15 décimales. v.2. 275 p. 1916. Hermann, Paris.

*Revue générale des sciences pures et appliquées*, July 15, 1917, p.409.  $\frac{1}{2}$  col.

**Andrews, Ewart S.**

Elementary strength of materials. Chapman & H., 4s. 6d. net.

*Electrical review (London)*, June 8, 1917, p.631.  $\frac{1}{2}$  col.

"Intelligible, thanks to the adoption of graphical methods, to all of average mathematical ability. Not merely students, but those engaged in practical designing work, will find the book of considerable service."



**Annual** chemical directory of the United States; ed. by B. F. Lovelace. 305 p. 1917. Williams and Wilkins Co., \$5.

*Chemical news*, July 20, 1917, p.36. ¼ col.

"Appears to be well planned and conveniently arranged, and it contains a large amount of information likely to be useful to chemical manufacturers, merchants, and engineers."

*Engineering and mining journal*, June 16, 1917, p.1083. ¼ col.

"Will be of great assistance in industrial preparedness to all those whom its contents concern. It includes complete lists of the American manufacturers of and dealers in acids, alkalies, colors, drugs...raw materials...synthetic products and many other laboratory products."

*Mining and scientific press*, Aug. 18, 1917, p.258. ¾ col.

"A good performance as far as it goes; it will doubtless improve with the experience of the publishers."

*Nature*, July 5, 1917, p.362. 2 col.

"A trade directory on a very broad gauge, and appeals to every section that is interested, even remotely, in chemical science and the chemical arts."

### Archbold, Maurice J.

Laboratory course of practical electricity for vocational schools and shop classes. 211 p. 1916. Macmillan, 5s. net.

*Electrical review (London)*, July 6, 1917, p.18. ¾ col.

"It is claimed that any text-book can be used in conjunction with this course of experiments, and the loose-leaf arrangement permits alteration of the order of work at the discretion of the teacher." *P. H. S. K.*

*Nature*, July 19, 1917, p.402. ¼ col.

"The leaflets are excellently adapted for the class of students for whom they have been written." *A. Russell.*

### Arnold, J. Loring.

Concise technical physics. 275 p. 1916. McGraw, \$2.

*Physical review*, Aug. 1917, p.216. ¼ p.

"Numerous instances of the author's lack of a thorough command of his subject prevent the reviewer, much to his regret, from recommending this book." *E. B.*

### Arny, Henry V.

Principles of pharmacy. Ed.2, rev. 1,056 p. Saunders, \$5.50 net.

*American journal of pharmacy*, July 1917, p.322. 1½ p.

"Professor Arny has, in his text-book, picked the wheat from the chaff...Excellent and extensive bibliography given at the end of each chapter." *Robert P. Fischelis.*

### Arthur, William.

Estimating building costs. 211 p. Williams, \$1.

*Concrete*, June 1917, p.244. ¼ col.

"Written to fill a demand for a smaller and less comprehensive book than the author's *New Building Estimator*...An excellent handy volume."

### Ashby, Hugh T.

Infant mortality. Putnam, \$3.25.

*American journal of nursing*, Aug. 1917, p.1142. ¼ col.

### Ashe, Sydney Whitmore, comp.

Organization in accident prevention. 130 p. McGraw, \$1.50.

*Iron age*, Aug. 23, 1917, p.456. ½ col.

*Safety*, July-Aug. 1917, p.174. ⅞ p.

"Helpful and stimulating to all who are interested in the subject."

### Ashley, W. B. ed.

Church advertising; its why and how. Lippincott, \$1 net.

*Inland printer*, Aug. 1917, p.685. ½ col.

"Replete with valuable suggestions to those interested in church work and advertising."

**Atack, F. W.** See **Chemists'** year book.

**Atkins, W. R. G.**

Some recent researches in plant physiology. 328 p. 1916. Whitaker.

*Botanical gazette*, July 1917, p.82. 1 p.

"Written in a most interesting as well as thoroughly scientific manner... Will attain its aim of stimulating research along many of the lines treated." *William Crocker*.

**Auk.** See **Palmer, T. S.**

**Austin, F. E.**

Examples in battery engineering. 90 p. 1917. Author, Hanover, N. H., \$1.25.

*Blast furnace and steel plant*, Sept. 1917, p.436.  $\frac{1}{2}$  col.

"Deals with the subject in a practical, logical, and systematic manner."

*Canadian engineer*, June 28, 1917, p.545.  $\frac{1}{2}$  col.

"Concise, accurate and to the point, and covers in a comprehensive way the fundamental principles involved in battery engineering. It should be valuable to engineering students and others who use batteries and to those who sell batteries." *E. G. Ernest*.

*Journal of the Franklin Institute*, Aug. 1917, p.323.  $\frac{1}{3}$  p.

"A perusal of this text should prove of decided value to any electrical student who wishes to acquire dexterity in dealing with battery problems." *Lucien E. Picolet*.

*Machinery*, July 1917, p.1038.  $\frac{1}{8}$  col.

"Is divided into sixteen lessons that were used in the author's classes... Accompanied by examples and problems which illustrate the principles explained."

*Power*, July 3, 1917, p.33.  $\frac{1}{2}$  col.

"Contains some good practical information and should find a field of usefulness among those who have to do with the operation of primary and secondary batteries."

*Telephony*, July 7, 1917, p.46.  $\frac{1}{2}$  col.

"Some 22 problems on both the primary and secondary or storage batteries are presented. About two-thirds of the book is devoted to a discussion relative to primary batteries."

**Austin, F. E.**

How to make high pressure transformers. Ed.2. 46 p. Author, Hanover, N. H., \$65.

*Blast furnace and steel plant*, Sept. 1917, p.436.  $\frac{1}{2}$  col.

"Written particularly for the experimenter who desires to make his own apparatus."

**Austin, F. E.**

Preliminary mathematics. 169 p. 1917. Author, Hanover, N. H., \$1.20.

*Industrial management*, July 1917, p.621.  $\frac{1}{2}$  col.

"Instructive text book... equally adaptable to class room work or individual study... Should prove valuable to the man who has had little opportunity in his earlier years to study arithmetic and algebra. To the man who did have, but who has forgotten the 'how and why,' it should be welcomed as a great help in refreshing his memory, and in enabling him to actually use mathematics in his regular work."

*Journal of the Franklin Institute*, July 1917, p.128.  $\frac{2}{3}$  p.

"Covers the elements of arithmetic and algebra usually taught in the lower schools... Contains a large number of problems and an unusually large number of them worked out in detail, a feature of value to the student depending wholly on his own resources." *Lucien E. Picolet*.

*Mining and scientific press*, June 30, 1917, p.936.  $\frac{1}{3}$  col.

"In this tiny volume is compressed a full course in algebra required for entrance examinations to any first-class college... As a self-teacher we believe the book to be a trifle too economical of explanation, but as a base to teach from we recommend it as peculiarly satisfactory."

**Australasian Antarctic expedition, 1911-14.**

Australasian Antarctic expedition, 1911-14, under Sir Douglas Mawson; Scientific reports, series C, zoology and botany, v.4, pt.1: Mollusca, by C. Hedley. 80 p.

*Annals and magazine of natural history*, Aug. 1917, p.280.  $\frac{3}{8}$  p.

"No general deductions are given, all such, we believe, being reserved for special treatment when all the branches of zoology have been dealt with."

**Australia.**

Memorandum on the organization of scientific research institutions in the United States of America, by Gerald Lightfoot. Government Printer, Victoria.

*Chemical news*, July 13, 1917, p.23.  $\frac{1}{2}$  col.

"The work of national, State and privately endowed institutions is described in some detail, and the general features of the organisation of some industrial laboratories are also discussed."

**Aydelotte, Frank.**

English and engineering; a volume of essays for English classes in engineering schools. 1917. Hill, 6s. 3d. net.

*Engineer*, July 6, 1917, p.15. 1 col.

"Twenty-seven essays by illustrious writers...Anthologies of this kind, like all anthologies, are open to criticism because tastes differ, but it must be admitted that Mr. Aydelotte has put before students a collection that is about as good as any other."

**Babbitt, Charles.**

Law applied to motor vehicles. Ed.2, by A. W. Blakemore. 1,262 p. West, \$7.50.

*India rubber world*, July 1917, p.592.  $\frac{1}{3}$  col.

"The epitome of thousands of judicial decisions, so arranged that the special circumstances of each case are set down as the reason for such decisions. An appendix gives the laws regarding right of way, laws of the road, street-traffic regulations, head-light laws, speed limitations, registration, etc...Second edition was prepared by Arthur W. Blakemore...who has added many decisions which have been handed down in the interim."

**Bacon, Raymond Foss, & Hamor, W. A.**

American petroleum industry. 2v. 963 p. 1916. McGraw, \$10.

*Economic geology*, June 1917, p.387.  $2\frac{1}{2}$  p.

"Carefully written, no pains apparently were spared to make it thoroughly reliable and authoritative. The ample references to the best literature on petroleum will be of service to investigators along many lines... 'A Glossary of Bitumenology' consisting of 78 pages...is one of the attractive and useful features." *C. J. Hares*.

**Bailey, Mrs Florence Augusta (Merriam).**

Handbook of birds of the western United States. Ed.7, rev. 574 p. 1917. Houghton, \$3.50 net.

*Auk*, July 1917, p.350.  $\frac{1}{2}$  p.

"The popularity of Mrs. Bailey's standard work on the birds of our western states is attested by the fact that a seventh revised edition has just been published... There are also many additional titles in the supplement to the list of 'Books of Reference.'"

**Bailey, G. H.**

Tutorial chemistry. pt.2: Metals and physical chemistry; ed. by William Briggs. Ed.3. 460 p. 1917. University Tutorial Press, 4s. 6d. net.

*Chemical news*, June 8, 1917, p.275.  $\frac{1}{2}$  col.

"A very useful if not indispensable text-book for students who hope to become candidates for the Intermediate Science Examination of London University. It is specially valuable for those whose time of preparation is short, and who therefore require very



**Bailey, G. H.**—*continued.*

careful guidance as to the exact scope of the syllabus... The section on physical chemistry has been considerably extended, and the whole text has been thoroughly revised."

*Nature*, May 24, 1917, p.244.  $\frac{1}{2}$  col.

"General character of this widely known textbook was described in the review of the first edition... in *Nature* for April 14, 1898... In the present issue the second half of the book dealing with physical chemistry has been completely recast by Mr. H. W. Bausor. The whole text has been revised, and the pages concerned with crystallography have been transferred to an appendix."

**Bailey, L. H.**

Pruning-manual; being the 18th edition, rev. and reset, of The pruning-book, which was first published in 1898. 407 p. 1916. Macmillan, 8s. 6d. net.

*Nature*, May 31, 1917, p.263.  $\frac{3}{4}$  col.

"Intended... to bring together the results of long experience in pruning 'as handed down from gardener to gardener, fruit-grower to fruit-grower, and as recorded in many books.'"

**Ball, Alice E.**

A year with the birds. 191 p. 1916. Author, Cleveland, \$3.

*Wilson bulletin*, June 1917, p.108.  $\frac{2}{3}$  p.

"Each of the 56 species treated... has a full-page plate in colors by Horsfall accompanying the description, which is in verse... Should make a strong appeal to the child who is forming early impressions of the birds." *L. J.*

**Ball, John.**

Geography and geology of west-central Sinai. 219 p. 1916. Government Press, Cairo, 30 p. t.

*Revue générale des sciences pures et appliquées*, July 15, 1917, p.410.  $\frac{1}{2}$  col.

**Ball, Sarah B. comp.**

One thousand six hundred business books. Ed.2. 232 p. 1917. H. W. Wilson, \$1.50.

*American industries*, July 1917, p.40.  $\frac{2}{3}$  col.

"Two departures from the previous edition are note-worthy. One is the special marking of books which in the compiler's opinion, are worth buying... The other improvement is a list of publishers appended which gives complete addresses."

**Bangay, R. D.**

Elementary principles of wireless telegraphy. pt.2, ed.2. 241 p. 1917. Wireless Press, 2s.

*Nature*, July 12, 1917, p.382.  $\frac{2}{3}$  p.

"To explain the theory and practice of wireless telegraphy to persons who do not possess much knowledge of the theory of electricity... We can warmly recommend the work as a trustworthy and stimulating introduction to the more elaborate treatises."

**Barber, F. D.**

First course in general science. 607 p. Holt.

*General science quarterly*, May 1917, p.240.  $\frac{2}{3}$  p.

"Very teachable." *Geo. Mounce.*

**Barbillion. L.**

Leçons sur le fonctionnement des groupes électrogènes en régime troublé. 306 p. Gauthier-Villars, Paris, 11 fr.

*Electrician*, July 20, 1917, p.624.  $\frac{3}{4}$  col.

"Valuable contribution to the literature of the subject, and should be studied by all those who have to deal with problems connected with the governing of electric generating sets. It is of no use to those who wish to obtain mechanical details of the various governing devices in present use." *A. E. Clayton.*

**Barker, Harry.**

Public utility rates. 387 p. McGraw, \$4 net.

*American gas engineering journal*, June 16, 1917, p.590.  $\frac{3}{4}$  col.

"The author's sympathies shade more towards the public official's side of the question than towards the utility's side... His chapter on gas utilities leaves much to be desired. His facts—statistical and historical—are accurate, but his understanding of the gas business is essentially academic."

*Electric railway journal*, June 16, 1917, p.1124.  $\frac{1}{2}$  col.

"Should be valuable for public authorities, engineers, company officials and others interested in public utility rate regulations... To almost any man a study of the book would prove broadening."

*Engineering news-record*, Aug. 16, 1917, p.322. 2 $\frac{1}{2}$  col.

"Valuable contribution to the subject of rate making. It should be read by all interested in this field of work—the engineer, the operator, the legislator and the public service commissioner." *Leonard Metcalf*.

**Barnard, R. J. A.**

Elementary dynamics of the particle and rigid body. 374 p. 1916. Macmillan, 6s.

*Nature*, June 21, 1917, p.322.  $\frac{1}{2}$  col.

"Very interesting endeavor to smooth the path of the beginner who is to continue his study of the subject when provided with the additional weapon afforded by the calculus." *W. J. G.*

**Barnes, John B.**

Elements of military sketching and map reading. Ed.3, rev. 106 p. 1917. Van Nostrand, \$.75.

*Scientific American*, July 14, 1917, p.36.  $\frac{1}{2}$  col.

"Simple in phraseology, it nevertheless provides full and exact information relating to scales, conventional signs, sketching implements, orientation, contours, road and position sketching, map reading, and landscape sketching. There are numerous helpful diagrams, and several large folders elucidating time scales, scale for paces, and position sketches."

**Bartholomew, J. G.**

Advanced atlas of physical and political geography. 1917. Oxford, 8s. 6d. net.

*Nature*, June 21, 1917, p.323.  $\frac{3}{4}$  col.

"Both in its plan and in its execution the atlas is excellent and is deserving of all praise as the best atlas of its kind that has been published." *R. N. R. B.*

**Bastin, Harold.**

British insects and how to know them. 129 p. 1917. Methuen, 1s. 6d. net.

*Nature*, July 19, 1917, p.404.  $\frac{1}{2}$  col.

"The effect is far from that of the dry, catalogue-like summary which might easily have been the result of an attempt to survey the whole class of insects in little more than a hundred pages." *G. H. C.*

**Battle, John Rome.**

Lubricating engineer's handbook. 333 p. 1916. Lippincott, \$4 net.

*Journal of physical chemistry*, June 1917, p.519. 4 $\frac{3}{4}$  p.

*Journal of the Engineers' Club of St. Louis*, May-June 1917, p.218. 1 $\frac{1}{4}$  p.

"If more... space had been given to a fuller presentation of technical data in regard to lubricants and lubrication it would have had a wider field of usefulness. However, the large amount of practical data which it contains should make it particularly valuable for the practicing engineer and the trade." *E. L. Ohle*.

**Bayliss, William M.**

Physiology of food and economy in diet. 107 p. 1917. Longmans, 2s. net.

*Journal of the Royal Sanitary Institute*, June 1917, p.28, sup. ½ p.

"A most useful and lucid statement which has the rare merit that it can be read with profit both by the man-in-the-street and the student... His advice to those who may be confused by the requirements of calories and protein in diet, is to 'Take care of the calories and the protein will take care of itself.'" *H. R. K.*

*Science*, July 6, 1917, p.18. ¼ col.

"In a hundred pages he presents in clear, concise and fascinating language the fundamental principles of nutrition." *Graham Lusk.*

**Beaton, Welford.** See **Waterhouse (Frank) & Company.****Beatty, James.**

Method of enzyme action. 138 p. 1917. Blakiston, \$1.75 net.

*Chemical news*, July 13, 1917, p.23. ⅓ col.

"Really important addition to the literature dealing with the nature and properties of enzymes."

*Journal of the Franklin Institute*, July 1917, p.129. ¾ p.

"This work, written and printed in England, is an interesting example of how the scientists of that country, even in the storm and stress of a struggle greater than any it has had to encounter since the days of the Armada, can yet find opportunity to discuss the most intricate problems, for the topic covered by the book is one of the most complex and difficult of all physical sciences, withal among the most important... Interesting and useful addition to the literature of an important and difficult phase of biologic chemistry." *Henry Leffmann.*

*Nature*, Aug. 2, 1917, p.443. 1 col.

"The chief object... is the suggestion of a hypothesis of enzyme action... It is held that the action of all enzymes can be reduced to the combination with H and OH radicles derived from water." *W. M. B.*

**Bek, Roustam.**

Aerial Russia. Lane, 2s. 6d.

*Aeronautics*, July 18, 1917, p.61. ½ col.

"Value... is marred by the somewhat bombastic style... The general public may get a roseate view of the aeronautical condition of the country prior to the war which is not quite justified."

**Benedict, Suzan Rose.**

A comparative study of the early treatises introducing into Europe the Hindu art of reckoning. 126 p. 1914. Rumford.

*Science progress*, July 1917, p.161. ⅝ p.

"Consists of a very laborious and useful contribution to our knowledge of the development of mathematics from the Dark Ages to the Renaissance." *Philip E. B. Jourdain.*

**Berg, Ernst Julius.**

Electrical engineering; advanced course. 332 p. 1916. McGraw.

*Physical review*, Aug. 1917, p.215. ⅓ p.

"A constructive contribution in the field between the more usual treatment of alternating currents, as given by Steinmetz, Bedell and Crehore and others, and advanced electrical theory as given by Maxwell, Heaviside, Webster and others." *F. B.*

**Berg, Georg.**

Die mikroskopische untersuchung der erzlagerstätten. 198 p. 1915. Borntraeger, Berlin, 7 m.

*Journal of geology*, May-June 1917, p.398. ½ p.

"For use in the laboratory... The work should be of great value, as it is the most complete that has come to the reviewer's hands." *A. D. B.*



**Berg, L. S.**

Les poissons des eaux douces de la Russie [Russian text]. 563 p. 1916. Department of Agriculture, Moscow.

*Nature*, May 17, 1917, p.222. 1 p.

"Written entirely in Russian... We are grateful to Prof. Berg for this fine volume; in its preparation he has studied a very complete material, comprising series of specimens from every lake and river in the Russian Empire, and the result is a work that is authoritative and of permanent value." C. T. R.

**Bingham, Charles.**

Manufacture of carbide of calcium. Raggett, 5s. net.

*Engineering review (London)*, April 16, 1917, p.312. 3/4 col.

"Rather a record of experience than a technical treatise... Anyone beginning the study of carbide manufacture would find Mr. Bingham's book irritating and confusing, because it assumes knowledge of the very particulars which the beginner most needs to learn... For those already engaged in the industry... the book should prove a veritable treasure... The arrangement... is without plan... and the absence of an index renders the defect still more inconvenient."

**Blair, Thomas S.**

Botanic drugs; their materia medica, pharmacology and therapeutics.

394 p. 1917. Therapeutic Digest Pub. Co., \$2.

*Journal of the American Pharmaceutical Association*, June 1917, p.591. 3/4 col.

"The pharmacist will find the book useful and not burdened with a large amount of unimportant or obsolete information; recent investigations on the subject are presented instead."

*Pennsylvania medical journal*, July 1917, p.742. 1/2 col.

"Dr. Blair has presented in this book in concise form an argument for the restudy and enlarged use of galenicals... All of the botanic drugs in common use are described, with a critical review of their therapy. The exact dose is given, how best employed and the distinctions in the use of allied drugs are gone into thoroughly."

**Blake, Henry W. & Jackson, Walter.**

Electric railway transportation. 487 p. McGraw, \$5 net.

*Electric railway journal*, June 23, 1917, p.1172. 5/8 col.

"Very little relating to the work of electric railway transportation departments has been published in book form, and the authors of this volume have attempted to fill a gap in the literature of the industry... Many valuable operating data have been collated." D. D. Ewing.

**Blichfeldt, H. F.**

Finite collineation groups, with an introduction to the theory of groups of operators and substitution of groups. 205 p. 1917. Univ. of Chicago Press, \$1.50 net.

*Scientific American*, July 14, 1917, p.36. 3/8 col.

"Develops the fundamental properties of linear transformations and linear groups, furnishes an introduction to the theory of groups of operators and substitution groups, determines the groups in two variables by a modification of Klein's process, proceeds to ternary and quaternary groups, sketches the history of linear groups, and carries a convenient appendix in which needed theorems and definitions of an advanced nature are explicitly given."

**Boeke, H. E.**

Grundlagen der physikalisch-chemischen petrographie. 428 p. 1915.

Borntraeger, Berlin.

*Journal of geology*, July-Aug. 1917, p.496. 1 1/8 p.

"An invaluable summary of work already done, and contains many suggestions for future work."

**Bouasse, M. H.**

Vision et reproduction des formes et des couleurs. 561 p. 1917.

Delagrave, Paris.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.619. 1 p.

**Bragg, W. H. & Bragg, L. W.**

X-rays and crystal structure. 229 p. 1915. G. Bell, London.

*London, Edinburgh and Dublin philosophical magazine*, Aug. 1917, p.151. ¼ p.

"Can be warmly recommended to the physicist as well as to the crystallographer and the chemist."

**Brearley, Harry.**

Heat treatment of tool steel. Ed.2. 224 p. Longmans, \$3.50.

*Sibley journal of engineering*, July 1917, p.228. ½ col.

"Written for the engineer, manufacturer's representative, foreman or trained artisan who might be interested in steels, particularly tool steels. The practical way in which the subject is discussed together with the many microphotographs have enabled the author to produce a work which well fulfills the purpose for which it was intended." *J. F. W.*

**Breslich, Ernst R.**

Second-year mathematics for secondary schools. Ed.2. 348 p. 1916. Cambridge University Press, 4s. net.

*Nature*, June 21, 1917, p.322. ¾ col.

"Deserving of careful consideration by the teacher of elementary mathematics as a part of general culture. It is conceived on sound lines." *W. J. G.*

**British Antarctic expedition, 1907-09.**

British Antarctic expedition, 1907-09, under the command of Sir E. H. Shackleton; Reports on the scientific investigations: Geology, v.2, Contributions to the palaeontology and petrology of South Victoria Land. 270 p. 1916. Heinemann, 3 guineas net.

*Nature*, Aug. 2, 1917, p.441. 1 col.

"A magnificent volume."

**Brown, H. W.**

Electrical equipment. 229 p. McGraw.

*Electrical age*, July 1917, p.41. ½ col.

"While... primarily for use in the author's classes of mechanical engineers at Cornell University, it is valuable as a concise outline of the field of industrial applications... A chapter on costs of apparatus and a number of problems, conclude the book."

**Brown, Kenneth.**

Guide to the registration of business names act. Pitman.

*Practical engineer*, June 14, 1917, p.283. 9 l.

"Mr. Brown... has endeavored to interpret the Act for the benefit of the harassed layman."

**Brown, William Alden.**

Portland cement industry. 158 p. Van Nostrand, \$3 net.

*Engineering news-record*, Aug. 16, 1917, p.325. ½ col.

"More attention is paid to the factory itself and to raw materials than to chemical investigations, although there are six chapters on the technique of testing."

*Railway age gazette*, July 20, 1917, p.96. ½ col.

"Intended for the producer of Portland cement and others who are interested in the details of its manufacture... Viewpoint is essentially English, but American practice is covered to a considerable extent, particularly as to machinery and equipment... The greatest amount of space is devoted to the machinery for crushing and grinding the materials and to the kilns for burning them."

**Brownell, Herbert.**

Laboratory lessons in general science. 240 p. Macmillan.

*General science quarterly*, May 1917, p.240. ¾ p.

"Promises to be one of the successful manuals. It will, as well, be a storehouse of suggestive material for grammar grade teachers." *B. Clifford Hendricks.*

**Brown's directory of American gas companies, 1917.** 897 p. 1917. Gas age, \$5.

*Gas age*, Aug. 1, 1917, p.99.  $\frac{7}{8}$  col.

"An immense amount of valuable matter for gas companies, for manufacturers, for engineers and in fact for anyone in search of authoritative information on the gas business... The greater part of the data... was collected during the past three months... Statistics are arranged in alphabetical order according to states and cities so that data concerning any company may readily be found. A company index and a city and town index further facilitate the use of the book."

**Brubaker, Albert.**

Compend of human physiology. Ed.14. Blakiston, \$1.25.

*American journal of nursing*, Aug. 1917, p.1142.  $\frac{1}{2}$  col.

"There has been elimination of old matter and the introduction of new, which naturally will make it of more value."

**Bullens, Denison K.**

Steel and its heat treatment. 431 p. 1916. Wiley, \$3.75 net.

*Brass world*, Aug. 1917, p.241.  $\frac{1}{2}$  col.

"Appears to be a good practical book, with a little science and just enough theory incorporated to explain the why and the wherefore of the various processes that are outlined."

*Engineer*, Aug. 3, 1917, p.101.  $\frac{1}{2}$  col.

"Its general tendency is thoroughly practical, but there is sufficient space devoted to the more scientific side of its subject to enable the reader to grasp the principal theoretical features so far discovered regarding the heat treatment of steel."

*Engineering review*, July 16, 1917, p.24.  $1\frac{1}{2}$  col.

"On the whole we commend the book." *Thomas Swinden*.

*Nature*, July 12, 1917, p.381. 1 col.

"To be warmly commended; it is well written and, on the whole, very accurate in its statements." *H. C. H. C.*

*Railway mechanical engineer*, June 1917, p.288.  $\frac{1}{2}$  col.

"Not limited to the scientific phase of the problem entirely. Methods for obtaining the different steel characteristics are thoroughly described... Well illustrated and contains information that men who are interested in heat treated metals should know."

**Burdick, Arthur J.**

Chemical tests for minerals. 93 p. Gateway Pub. Co., Beaumont, Cal., \$1.25 net.

*Mining American*, Aug. 4, 1917, p.5.  $\frac{1}{2}$  col.

"It should, together with the simple outfit it recommends, be in the outfit of every prospector. The text matter will be comprehended by anybody."

**Burdick, H. C., and others.**

Sales promotion by mail. 359 p. Putnam, \$2.

*Business philosopher*, July 1917, p.35.  $1\frac{1}{4}$  p.

"Deals with every phase of getting business through the mails. Its field of usefulness is wide... Experience has shown that the sale of practically every known commodity may be increased by a judicious use of the mails... The ten authors are all men of wide and successful experience."

**Burrell, George A.**

Gasoline. 281 p. Oil Statistical Society.

*Sibley journal of engineering*, Aug. 1917, p.240.  $1\frac{1}{2}$  col.

"Aims to give useful information of a scientific sort to all interested in gasoline... Not divided into chapters and has no index... Not written primarily for engineers or engineering students, but much of the material will be found helpful to them because it gives information which is very difficult to find elsewhere." *C. A. P.*

**Butler, Edward.**

Vaporizing of paraffin for high-speed motors. 128 p. 1917. Lip-pincott.

*Scientific American*, Aug. 4, 1917, p.86.  $\frac{1}{2}$  col.

"Presents the various types of petrol carburetors, and reviews the present situation in regard to the vaporization of paraffin both in oil engines and the high-speed marine engine, with a special chapter on its adaptation to road car and tractor motors."



**Butler, G. Montague.**

Pocket handbook of minerals. Ed.2. 311 p. 1912. Chapman & H.,  
11s. 6d. net.

*Geological magazine*, Aug. 1917, p.378. 1 p.

"Additions have been made here and there to the original text where experience has suggested the need."

*Mining magazine*, June 1917, p.320. ¼ col.

"Designed for use in the field or class-room, with little reference to chemical tests."

**Cahill, Mary F. & Ruggeri, A. C.**

Office practice. Macmillan, \$.90.

*Business philosopher*, Aug. 1917, p.38. ¼ p.

"The entire field of office work is admirably covered."

**Caldwell, Otis W. & Eikenberry, W. L.**

Elements of general science. 308 p. Ginn.

*General science quarterly*, May 1917, p.241. ¾ p.

"To place before the pupil some of the larger and more fundamental facts, principles and notions of the science of the common yet significant things." *Roland H. Williams.*

**Caralp, Henry.**

Chaudières et machines de la marine de guerre. Ed.3, v.1: Chau-  
dières. 520 p. 1917. Challamel, Paris, 9 fr.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.624. ¾ p.

Card index system. 121 p. Pitman, 1 s. (Practical primers of busi-  
ness.)

*Practical engineer*, June 21, 1917, p.299. ¼ col.

"Gives in a succinct form, but in sufficient detail, a description of the principles underlying the card index system, and how they are applied. . . An easily understood guide such as this helps both in the matter of installation and the making the most of it."

**Carpenter, Ford A.**

The aviator and the weather bureau. 54 p. Ed.2. 1917. Chamber  
of Commerce, San Diego.

*Nature*, May 31, 1917, p.263. ¼ col.

"Points out the advantage of the climate of California for aviation studies, and gives in chap. iii. an account of an ascent made by the author over the city of San Diego."

*Scientific American*, Aug. 18, 1917, p.128. ¼ col.

"Of distinct value to all who are interested either in weather or in aviation."

**Carrel, A. & Dehelly, G.**

Le traitement des plates infectées. 177 p. 1917. Masson, Paris, 4 fr.

*Nature*, July 5, 1917, p.363. ¼ col.

"Some months ago a system of treatment of septic wounds was described by Dr. Carrel. . . Considerable success is claimed for this method. . . and in this volume Drs. Carrel and Dehelly give full particulars how it is applied. Reproductions of photographs clearly illustrate the methods of arranging the irrigation tubes." *R. T. H.*

**Carslaw, H. S.**

Elements of non-Euclidean plane geometry and trigonometry. 179 p.  
1916. Longmans, 5s. net.

*Bulletin of the American Mathematical Society*, July 1917, p.461. 6 p.

"Interesting book. . . Some things are omitted which we regret to miss, but nothing is included which might better have been left out. The choice of material seems largely guided by the principle that the book was primarily written for teachers." *J. L. Coolidge.*

*Nature*, June 14, 1917, p.302. ¼ col.

"One of the best introductions to the subject we have seen." *G. B. M.*

**Cashmore, M.**

Fermat's last theorem. 63 p. 1916. G. Bell, 2s. net.

*Nature*, June 14, 1917, p.302. ¼ col.

"Paradoxical tract." *G. B. M.*

**Casson, H. N.**

Factory efficiency. *Efficiency Mag.*, 10s. 6d.

*Brick and pottery trades journal*, July 2, 1917, p.150. 2 col.

"To show to British manufacturers generally what is meant by the efficient management of their works in the sense in which this word is used by a man who has devoted his life to studying how to improve various businesses."

**Castle, W. E.**

Genetics and eugenics. 346 p. 1916. Harvard Univ. Press, \$2.

*Transactions of the American Microscopical Society*, April 1917, p.110. 1 p.

"Text book for college students... reference book for breeders of plants and animals, and... summary of present views for the intelligent person interested in this field of research... Well calculated to succeed in meeting these purposes."

**Castle, W. E. & Wright, Sewall.**

Studies of inheritance in guinea-pigs and rats. 192 p. 1916. Carnegie Institution of Washington, \$2.50.

*Revue générale des sciences pures et appliquées*, May 30, 1917, p.316. 2 col.

**Caven, R. M.**

Short system of qualitative analysis for students of inorganic chemistry. 162 p. 1917. Blackie, 2s.

*Chemical news*, June 8, 1917, p.275. ½ col.

"An abridgment of the author's 'Systematic Qualitative Analysis,' and contains a very useful first course in inorganic analytical work which would give the student a thorough grounding in its principles and practice."

*Nature*, July 26, 1917, p.422. ½ col.

"The chief novelty... is the arrangement... Thus the action of heat and other dry tests are taken first, and are followed by the action of solvents and, finally, by that of group reagents." *J. B. C.*

**Cederberg, Ivar W.**

Die thermodynamische berechnung chemischer affinitäten von homogenen und heterogenen gasreaktionen. 109 p. 1916. Friedländer, Berlin.

*Journal of the American Chemical Society*, July 1917, p.1514. ½ p.

"Another attempt to calculate affinity constants (free energy) from the so-called chemical constants of Nernst. The method... is familiar to readers of recent literature in the field of applied thermodynamics, and the author introduces no new experimental material."

**Chamberlin, T. C.**

Origin of the earth. 271 p. 1916. Univ. of Chicago Press.

*Geological magazine*, June 1917, p.279. 2½ p.

"Deserves attention by all geologists interested in the early history of the earth, and can be read with interest by any student of either geology or geography." *J. W. G.*

**Charpy, G.**

Conditions et essais de réception des métaux. 106 p. 1917. Dunod & Pinat, Paris, 3 fr. 50.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.621. 2 p.

**Chauveau, C.**

La France agricole et la guerre. 302 p. 1917. J. B. Baillièrè, Paris, 3 fr. 50.

*Bulletin de la Société d'Encouragement*, March-April 1917, p.441. ½ p.

*Revue générale des sciences pures et appliquées*, May 15, 1917, p.283. 1¼ col.

**Chauveau, C.**

Notes de culture mécanique. 551 p. 1917. J. B. Baillièrè, Paris, 12 fr.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.620. 1 p.

*Revue générale des sciences pures et appliquées*, June 15, 1917, p.347. 1 col.

**Chemical Rubber Company.**

Handbook of chemistry and physics. Ed.5. 414 p. The Company, Cleveland, \$2 net.

*Coal age*, Aug. 18, 1917, p.290.  $\frac{5}{8}$  col.

"Is, if possible, more complete than foregoing issues...About 60 pages of new material."

*Mining and scientific press*, June 30, 1917, p. 936.  $\frac{1}{3}$  col.

"Has been brought up to date by compilation from accepted first-hand sources of information...No single handbook will answer every question, but this will answer so large a number as to save many a long hunt through voluminous text-books."

**Chemists' year book, 1917**; ed. by F. W. Atack & L. Whinyates. Ed.3. 2v. 1917. Sherratt & H., 10s. 6d. net.

*Chemical news*, June 8, 1917, p.275.  $\frac{1}{8}$  col.

"Considerable alteration has been made in some sections of the third edition...Contains a great number of tables, giving numerical data of all kinds and physical constants, and it also contains complete directions for qualitative analysis and for many processes of technical analysis."

*Journal of the Society of Chemical Industry*, May 15, 1917, p.522.  $\frac{1}{8}$  col.

"Fully maintains the standard of its predecessors."

*Nature*, May 17, 1917, p.225.  $\frac{1}{4}$  col.

"The thorough editorial work has well maintained the trustworthiness and up-to-date character of this comprehensive compilation."

**Church, A. Hamilton.**

Manufacturing costs and accounts. 452 p. Hill Pub. Co., 21s. net.

*Electrician*, July 6, 1917, p.549.  $\frac{3}{8}$  col.

"Whilst the book is written chiefly for accountants, and deals with the cost accounting side of a factory, it contains much matter interesting for the works manager and foremen, and especially emphasises the value to the production department of immediate cost figures, so that investigations may be conducted whilst the circumstances are fresh in everyone's mind."

**Clark, A. Graham.**

Text book on motor car engineering. v.2: Design. 368 p. 1917. Van Nostrand, \$2.50.

*Canadian engineer*, July 26, 1917, p.181.  $\frac{1}{2}$  col.

"Written from the British viewpoint, this book deals with the design of the petrol engine and chassis, and is intended for the use of engineers, designers, draughtsmen, students and others whose work entails a knowledge of design."

*Mechanical engineer*, July 27, 1917, p.529.  $\frac{1}{2}$  col.

"To all who desire to understand the mechanics of the motor-car, as well as those who are dealing with the design of these popular vehicles, we heartily commend the book."

**Clark, Bertha M.**

Introduction to science. 494 p. Am. Bk.

*General science quarterly*, May 1917, p.242.  $\frac{5}{8}$  p.

"Probably no other similar text contains so much information about science and its applications." *M. C. Leonard.*

**Cleland, H. F.**

Geology, physical and historical. 718 p. Am. Bk., \$3.50.

*Nature*, Aug. 2, 1917, p.441.  $1\frac{1}{4}$  col.

"Though Prof. Cleland's text-book will be useful, it is not up to the usual high standard of American geological literature."

**Clowes, F. & Coleman, J. B.**

Elementary practical chemistry. Ed.8. pt.2. 255 p. 1916. Churchill, 3s. 6d. net.

*Nature*, May 17, 1917, p.223.  $\frac{1}{2}$  col.

"The subject matter has been increased and rearranged... The descriptions are lucid, and the information generally trustworthy."



**Cocking, Walter Cyril.**

Calculations for steel frame structures; designed to comply with the requirements of the London County Council (general powers) act, 1909. 312 p. Van Nostrand, \$2.25 net. (Broadway series of engineering handbooks.)

*Engineering news-record*, July 19, 1917, p.127. 1 col.

"An engineer or draftsman with only a mastery of the book and the little knowledge it presupposes is not sufficiently equipped to design steel-frame structures other than those of the simplest kind." *R. Fleming*.

*Iron and coal trades review*, June 1, 1917, p.637. ½ col.

"Upon the whole, this is an excellent book of practical value to the student."

**Coffin, Joseph George.**

Calcul vectoriel, avec applications aux mathématiques et à la physique; tr. par A. Véronnet. 1914. Gauthier-Villars, Paris, 7 fr. 50.

*Annales des ponts et chaussées*, March-April 1917, p.244. 4½ p.

**Compton, William.**

Origin of the lumber industry. Am. Lumberman.

*American forestry*, June 1917, p.374. ¾ col.

"Contains a vast fund of information, presents a balanced view, ethically speaking, of the lumber industry, and it develops much that has been poorly understood in the economics of that industry. No publication comes to mind in which so many significant facts relating to timber and the lumber industry are brought into so small a compass."

**Comstock, Daniel F. & Troland, L. T.**

Nature of matter and electricity; an outline of modern views. 204 p. Van Nostrand, \$2.

*Electrical world*, July 7, 1917, p.24. ½ col.

"On the modern physics of matter intended for the general reader and written without mathematics."

**Cook, Arthur L.**

Interior wiring and systems for electric light and power service. 416 p. 1917. Wiley, \$2.

*Electrical world*, June 30, 1917, p.1268. ½ col.

"As a guide to modern practice in electric lighting and power applications and in the design and installation of the wiring for such purposes, this volume fills the need of electrical workers who wish to become familiar with good practice in these branches."

*Scientific American*, Aug. 18, 1917, p.128. ½ col.

"Chief beneficiaries will be superintendents, operators and wiremen, and these will find their problems plainly stated, with clues to the most approved methods of solving them."

**Coolidge, Emelyn Lincoln.**

Home care of sick children. 282 p. 1916. Appleton, \$1.

*Journal of home economics*, July 1917, p.343. 1½ col.

"Dr. Coolidge has drawn from her vast experience those specific methods of nursing assistance which may be given by any intelligent mother. Technical terms have been eliminated except where they are necessary for a thorough understanding of the condition under discussion. . . Its most practical value lies in its use as a book of reference in the home and not as a daily guide." *Ira S. Wile*.

**Coombs, R. D.**

Pole and tower lines for electric power transmission. 272 p. Hill Pub. Co., 10s. 6d.

*Electrician*, July 27, 1917, p.664. 1 col.

"Has primarily been written for the use of American engineers, and, for the most part, it deals with the mechanical rather than the electrical aspects of electric power transmission." *B. Welbourn*.

**Cooper, G. Stanley.**

By-product coking. 174 p. 1917. Benn, \$3.

*American gas engineering journal*, Aug. 25, 1917, p.183. ¼ col.

"Exceedingly useful and well prepared work on a subject upon which there is an insufficiency of available literature. Though written from the English point of view, the author manifests an exceptional familiarity with foreign practices, and especially marks the differences with American practice."

*Gas age*, Aug. 15, 1917, p.148. ¾ col.

"Aim... is to supply a suitable text book... Typical installations have been chosen for description."

*Iron and coal trades review*, July 13, 1917, p.38. ¾ col.

"Intended primarily for the student, but can be perused also, profitably, by a wider circle of readers, as all intricate technical explanations have been avoided as much as possible, while the expert may also find food for thought in its pages."

**Cooper, W. R.**

Primary batteries; their theory, construction and use. Ed.2. 457 p. 12s. 6d. net.

*Engineering review*, June 15, 1917, p.376. 1 col.

"A new chapter has been added on selenium cells, and for the rest the book has been brought thoroughly up to date without departing from the author's original intention of describing only those ways and means which are in practical use or of special theoretical interest."

**Copeland, M. T. ed.**

Business statistics. 696 p. Harvard Univ. Press, \$3.75 net. (Harvard business studies, v.3.)

*Publishers' weekly*, Aug. 18, 1917, p.575. ¾ col.

"Cannot be too highly commended as a source book in the methods of compiling and adapting concrete figures to business problems."

**Cowee, George Alvin.**

Practical safety methods and devices. 434 p. 1916. Van Nostrand, \$3.

*Journal of the American Society of Mechanical Engineers*, July 1917, p.681. 1 p.

"Aims to cover a very wide range of industrial activity. Its author's intent, therefore, is, undoubtedly, to bring out the underlying principles of safety and welfare in the various fields he has dealt with rather than to work out detailed safeguards and methods for each individual condition of industry. He has apparently succeeded quite well."  
*John Price Jackson.*

**Crabtree, J. H.**

Fresh-water insects and how to identify them. 64 p. Kelly, 1s. 3d. net.

*Nature*, July 19, 1917, p.404. ½ col.

"Simple, unambitious book, but the author's standard of accuracy should have been higher."

**Crandall, Lee S.**

Pets; their history and care. 372 p. Holt.

*Bird-lore*, July-Aug. 1917, p.213. 1 col.

"Treats of Mammals, Birds, Reptiles and Batrachians, and the Aquarium." *F. M. C.*

**Creager, William Pitcher.**

Engineering for masonry dams. 250 p. 1917. Wiley, \$2.50 net.

*Canadian engineer*, Aug. 30, 1917, p.188. ½ col.

"This excellent book... covers very completely the various methods and assumptions usually employed in conservative practice in the design of various types of masonry dams."

**Crile, George W.**

Man, an adaptive mechanism. 1916. Macmillan, \$2.50.

*Saint Paul medical journal*, Aug. 1917, p.262.  $\frac{1}{4}$  col.

"Sums up his conclusions attained from his own research and wide range of scientific reading. . . Perhaps the most startling conception submitted is that the reactions to stimuli in plants, lower animals and the human, are one and the same process." C. B. Drake.

**Croft, Terrell.**

Electrical machinery. 318 p. 1917. McGraw, \$2.

*Power*, Aug. 14, 1917, p.238.  $\frac{3}{8}$  col.

"Author has endeavored to include the essential things for the practical man to know about electrical machinery and to omit the nonessentials."

**Croft, Terrell.**

Wiring for light and power. 400 p. McGraw, \$2.

*Electrical record*, July 1917, p.71.  $\frac{1}{3}$  col.

"Purpose. . . is to supply explanations, elaborations and illustrations for those sections of the National Electrical Code to which it is necessary to refer most frequently. . . Has incorporated in it, verbatim, the most important National-Electrical-Code regulations. Then these regulations or rulings and their application to practical electrical construction are explained by supplementary text prepared by the author and fully illustrated."

**Croft, Terrell.**

Wiring of finished buildings. 275 p. Hill Pub. Co., 8s. 4d.

*Electrician*, July 20, 1917, p.627.  $\frac{1}{2}$  col.

"Although the central station engineer and the wiring contractor may find some points of considerable interest in this volume, it applies essentially to American conditions."

**Crosby, Maunsell Schiefflin.**

Rhinebeck birds and seasons; articles published in the Rhinebeck Gazette, October 3rd 1914, to September 25th 1915. 1916. Rhinebeck Bird Club, Rhinebeck, N. Y.

*Auk*, July 1917, p.357.  $\frac{1}{2}$  p.

"Gives an excellent résumé of methods to attract birds; an account of the winter bird life of the vicinity of Rhinebeck, N. Y.; the spring and autumn migration and the nesting season, all of which abound in accurate dates drawn from Mr. Crosby's large experience." W. S.

**Crowell & Murray.**

Iron ores of Lake Superior. Ed.3. 315 p. Penton Pub. Co., \$3.50 net.

*Canadian mining journal*, Aug. 15, 1917, p.327.  $\frac{1}{2}$  col.

"Excellent handbook. . . The matter has been brought up to date and new features added."

*Iron age*, Aug. 23, 1917, p.457.  $\frac{1}{2}$  col.

"Valuable source of information."

*Iron trade review*, Aug. 23, 1917, p.391.  $\frac{3}{8}$  col.

"All the material has been brought up to date and greatly amplified."

**Croy, Mae Savell.**

1,000 hints on flowers and birds. Putnam, \$1.50.

*American forestry*, Aug. 1917, p.504.  $\frac{1}{3}$  col.

"Written for those who are interested in flower culture and in the establishment of wild life about the home. . . The information, classified under appropriate headings and exhaustively indexed, will prove invaluable to the flower lover and gardener."

**Culbreth, David M. R.**

Materia medica and pharmacology. Ed.6, rev. 1,001 p. 1917. Lea, \$5.25 net.

*American journal of pharmacy*, July 1917, p.324.  $1\frac{1}{2}$  p.

"On the whole its contents entitle it to a prominent place in our list of pharmaceutical textbooks." Robert P. Fischelis.



**Cumming, Alexander Charles, & Kay, S. A.**

Text-book of quantitative chemical analysis. Ed.2. 402 p. 1916.  
Gurney & J., 9s. net.

*Nature*, May 17, 1917, p.223.  $\frac{1}{3}$  col.

"Intended for university and college students...The directions...are clear and precise; the examples are well chosen; and everything is done to inculcate cleanliness and accuracy in manipulation." C. S.

*Transactions of the Faraday Society*, June 1917, p.328.  $\frac{3}{8}$  p.

**Cunning, Mrs Joseph, & Campbell, A.**

The healthy girl. 191 p. 1916. Frowde, \$1.75.

*Social hygiene*, July 1917, p.387.  $\frac{1}{2}$  p.

"Acquaints the budding girl with her own body and the purposes and functions of the various organs in an instructive and pleasing manner." E. R. E.

**Cushny, A. R.**

Secretion of the urine. 241 p. 1917. Longmans, 9s. net. (Monographs on physiology.)

*Nature*, June 14, 1917, p.304.  $\frac{3}{4}$  col.

"In this extremely valuable monograph Prof. Cushny gives an admirable account of the kidney, and discusses various views held as to its functions. Many other matters, such as the action of drugs upon it and the changes that occur in disease are included, and the bibliography appended is of a most complete kind."

**Dales, B. & Barnebey, O. L.**

Elementary qualitative analysis; a laboratory guide. 205 p. 1916.  
Wiley, 5s. 6d. net.

*Nature*, June 7, 1917, p.281.  $\frac{1}{2}$  col.

"Designed for the use of students who have done a year's work in general chemistry...The instructions are clear; concise explanatory statements add considerably to their value, and the purpose of qualitative analysis as a basis for further practical study of chemistry is very satisfactorily explained." C. A. K.

**Dancaster, Ernest A.**

Lime and cement; their nature, manufacture and use. Appleton,  
\$2.25 net.

*Concrete*, June 1917, p.244.  $\frac{1}{2}$  col.

"Useful, though somewhat elementary treatise."

**Darbishire, A. D.**

Introduction to a biology, and other papers. 291 p. 1917. Cassell,  
7s. 6d. net.

*Nature*, June 14, 1917, p.304.  $\frac{3}{4}$  col.

"Principal theme is that the intelligence of man is of utilitarian origin, developing gradually as he gradually acquired more and more control over his material surroundings. Hence the circumstances of its development have led to man's welcoming a mechanistic theory of the organism and a materialistic theory of evolution to the neglect of other points of view."

**Darboux, G.**

Principes de géométrie analytique. 520 p. 1917. Gauthier-Villars,  
Paris, 20 fr.

*Revue générale des sciences pures et appliquées*, June 30, 1917, p.377.  $1\frac{1}{2}$  col.

**Davis, Arthur Powell.**

Irrigation works constructed by the United States government.  
413 p. 1917. Wiley, \$4.50 net.

*Canadian engineer*, July 26, 1917, p.80. 1 col.

"Valuable work of reference for all engaged in irrigation engineering...Gives a very full description of the important features involved in the construction of the large irrigation works by the United States Federal Government...These works included the

**Davis, Arthur Powell—continued.**

designing and construction of the four highest existing dams constructed to date in any country, and for which no precedent exists." *A. S. Dawson.*

*Scientific American*, Aug. 4, 1917, p.86.  $\frac{1}{2}$  col.

"Presents twenty-one of the great irrigation projects from the engineering point of view, minutely describing the salient features of each with tables of area and capacity, analytic diagrams, and data of costs and expense of operation and maintenance."

**Dawes, Chester L.**

Electrical measurements and testing; direct- and alternating-current. Wiley, 3s. net.

*Nature*, July 19, 1917, p.402.  $\frac{1}{4}$  col.

"'Loose-leaf' laboratory manual. The leaflets are thoroughly practical, and the arrangement of the experiments is excellent." *A. Russell.*

**Delgado de Carvalho, C. M.**

Météorologie du Brésil. 527 p. 1917. Bale, 25s. net.

*Nature*, July 5, 1917, p.364.  $\frac{3}{4}$  col.

"Very welcome, not only to meteorologists, but also to those having interests in this progressive Republic. . . We have put before us in a very readable and instructive form a series of pictures showing not only the diverse character of the climates of Brazil, but also the interconnection that exists between climatic conditions and migration, immigration and public health." *R. C. M.*

**Del Mar, Algernon.**

Tube milling; a treatise on the practical application of the tube mill to metallurgical problems. 159 p. 1917. McGraw, \$2.

*Engineering and mining journal*, June 16, 1917, p.1083.  $\frac{1}{2}$  col.

"Mr. Del Mar has accomplished a worthwhile service to the metallurgical industry by collecting in one volume most of the important data treating of tube mills and their operation. The general principles upon which tube mills are operated, the different kinds of mills in operation and the ways of handling them in different localities are well pointed out."

*Mining and scientific press*, June 23, 1917, p.901.  $\frac{7}{8}$  col.

"A handbook of details, presented in orderly manner, that must prove useful to designers of new plants and to engineers in working out their efficiency problems."

**Demeny, G.**

Éducation physique des adolescents. 157 p. 1917. Alcan, Paris, 2 fr. 50.

*Revue générale des sciences pures et appliquées*, May 15, 1917, p.283.  $\frac{2}{3}$  col.

**Dercum, Francis X.**

Rest, suggestion, and other therapeutic measures in nervous and mental diseases. Blakiston, \$3.50 net.

*Saint Paul medical journal*, July 1917, p.228.  $\frac{4}{5}$  col.

"Treatise of practical value to the average physician. The discussions are clear, simple and direct; they give the reader the impression that the far too prevalent mysteries surrounding functional nervous diseases, find, really after all, no excuse for their existence. Physiologic methods and psychotherapy are given major places; medicines only a place of secondary importance." *J. C. Michael.*

**Despaux, A.**

Qu'est-ce que l'électricité? Qu'est-ce que le magnétisme? 1917.

Dunod & Pinat, Paris, 7 fr. 50.

*Bulletin de la Société Internationale des Electriciens*, June 1917, p.152.  $\frac{2}{3}$  p.

**Dewell, Henry D.**

Timber framing. 272 p. Dewey, \$2.

*Mining and scientific press*, June 23, 1917, p.902.  $\frac{2}{3}$  col.

"Has been prepared with care, not so much for the engineer experienced along these lines, but rather for the practical man who desires also to know."

**Dewing, Arthur S.**

Corporate promotions and reorganizations. 615 p. Harvard Univ. Press, \$2.50.

*American industries*, July 1917, p.40.  $\frac{3}{4}$  col.

"Author's plan is to trace in minute detail the history of a score of industrial concerns, and by classifying the causes in each particular case, arrive at a general reason for the necessity of reorganization in so many industries."

**Dicksee, Lawrence R.**

Office machinery. Gee.

*Journal of accountancy*, Aug. 1917, p.155.  $\frac{1}{3}$  p.

"Americans may well take a modest pride in the knowledge that our ingenious mechanical devices are so strongly recommended by Professor Dicksee to enable England's business men to keep things going."

**Directory** of paper makers of the United Kingdom for 1917. 236 p. Marchant, 1s. net.

*Chemical news*, July 6, 1917, p.12.  $\frac{1}{2}$  col.

"Carefully revised, and many additions have been made to the list of water-marks and trade names."

**Dover, A. T.**

Electric traction; a treatise on the application of electric power to tramways and railways. 667 p. Macmillan, \$5.50.

*Electric railway journal*, July 14, 1917, p.88.  $\frac{3}{4}$  col.

"A work which all who have to do with rolling stock and power distribution on electric railways can read with profit, even though much of the equipment described is of British manufacture."

*Electrical world*, Aug. 4, 1917, p.216.  $\frac{5}{8}$  col.

"Has not tried to cover generating stations and transmission lines... Addressed to a circle of readers familiar in a general way with the fundamentals of mechanics, electric circuits and engineering principles, who desire information on the peculiar problems of electric traction and the way in which these problems have been solved... Covers direct-current and alternating-current railways... and should prove valuable as a reference work."

*Journal of the Royal Society of Arts*, Aug. 3, 1917, p.643.  $1\frac{3}{8}$  col.

"Deals only with the track, the overhead arrangements, the motors and trucks, controlling apparatus, substations, and distributing systems."

*Mechanical engineer*, July 27, 1917, p.529.  $\frac{1}{4}$  col.

"Intended for engineers and advanced students."

*Model engineer and electrician*, May 31, 1917, p.348.  $\frac{1}{4}$  col.

"A mine of information... Not confined to British practice, but deals with Continental and American designs also... Valuable for reference to many engineers, designers, and students."

*Nature*, June 28, 1917, p.341.  $2\frac{3}{8}$  col.

"A treatise which engineers and advanced students will find most useful... Little original matter in the work, but the author shows good judgment and no little knowledge in his selection and treatment of the various branches of this important subject." *A. Russell.*

**Dubosc, André.**

Les cholestérols au point de vue scientifique et industriel. 102 p. 1917. Le Caoutchouc et la Guttapercha, Paris.

*Revue générale des sciences pures et appliquées*, May 30, 1917, p.315. 1 col.

**Dudley, Emilius C. & Stowe, H. M. ed.**

Gynecology. Year Book Pub. Co., \$1.35. (Practical medicine series, 1916, v.4.)

*Saint Paul medical journal*, July 1917, p.227.  $\frac{1}{3}$  col.

"Very complete and well arranged review of the gynecologic literature during the past year... Will repay a careful reading." *B. H. Ogden.*



**Duhem, P.**

Le système du monde; histoire des doctrines cosmologiques de Platon à Copernic. v.4. 597 p. 1916. Hermann, Paris, 19 fr.

*Revue générale des sciences pures et appliquées*, May 30, 1917, p.312. 7 col.

**Dumont, E.**

Théorie générale des nombres, définitions fondamentales. 194 p. 1915. Gauthiers-Villars, Paris, 2 fr.

*Revue générale des sciences pures et appliquées*, June 15, 1917, p.346. 1 col.

**Dunkley, W. G.**

Design of machine elements. 2v. v.1, 217 p., v.2, 296 p. Van Nostrand, \$1.50 each. (Broadway series of engineering handbooks.)

*Industrial management*, July 1917, p.621. ½ col.

"The principles of mechanics as applied to the design of the elements of machines are illustrated in considerable detail. . . Technical students will find this of use as an aid to shop work and it contains much information of value to draftsmen."

*Ironmonger*, June 2, 1917, p.45. ¼ col.

"For students and draughtsmen engaged in engineering design. They cover the main principles on which the design of machine elements is based, and deal with the subject matter both from theoretical and practical points of view."

*Scientific American*, June 16, 1917, p.604. (Review of v.1.) ½ col.

"The subjects are well presented, with clear explanatory illustrations and numerous tables. Those interested in engineering design will find. . . very concise and valuable expositions, and information of decided value in convenient form for reference."

**Durand, W. F.**

Practical marine engineering, for marine engineers and students; ed.4, rev. & enl. by C. W. Dyson. 982 p. Marine Engineering, \$6.

*Power*, Aug. 14, 1917, p.238. ½ col.

"Considerable has been added to bring the subject matter up to date. . . One of the best volumes for the practical marine engineer."

**Durham, H. W.**

Saws; their care and treatment. Rider, 5s. net.

*Engineer*, Aug. 3, 1917, p.101. ½ col.

"Deals primarily with wood-working saws. . . Filled with a great quantity of practical information acquired by the author during his lengthy study of the branch of engineering in which he specialised."

**Dyson, C. W. See Durand, W. F.****E., S. G.**

Repairing the player piano. Musical Opinion and Music Trades Review, 1s. net.

*Model engineer and electrician*, May 17, 1917, p.316. ¼ col.

**E., S. G.**

Repairing the reed organ and harmonium. Musical Opinion and Music Trades Review, 1s. net.

*Model engineer and electrician*, May 17, 1917, p.316. ¼ col.

"Should be useful to tuners and repairers, and to mechanics who possess either of the instruments mentioned."

Companion book to author's "Repairing the player piano."

**Eckles, C. H. & Warren, G. F.**

Dairy farming. 309 p. 1916. Macmillan, 5s. net.

*Nature*, July 12, 1917, p.383. ½ col.

"Intended for teaching purposes, and there are questions and problems at the end of each chapter, also a list of books in some cases which may be read with advantage."

**Ecroyd, S.**

Cotton year book and diary, 1917. 868 p. Marsden, 2s. 6d. net.

*India rubber world*, Aug. 1917, p.657. ¼ col.

"Contains in compact compass a vast amount of information regarding the cotton industry in England. . . A large part of the book is given over to information regarding processes and machinery, every detail of manufacture being explained, with simple illustrations and diagrams."

**Edwards, C. A.**

Physico-chemical properties of steel. 1916. C. Griffin, 10s. 6d. net.

*Transactions of the Faraday Society*, June 1917, p.323. 1½ p.

"**Electrical review's**" electrical and allied trades directory. 1,161 p. 1917. Alabaster, 21s. (The red book.)

*Practical engineer*, June 14, 1917, p.283. ½ col.

"Has been as carefully revised as previous issues, and it still stands as the indispensable work of reference on electrical undertakings."

"**Electrician**" electrical trades' directory for 1917. 1,382 p. Electrician, \$4.

*Electrical world*, Aug. 18, 1917, p.312. ¼ col.

"Much valuable information."

*Iron and coal trades review*, June 1, 1917, p.637. ⅓ col.

"Well arranged and exhaustive book of reference."

"**Electrician**" tables of electricity undertakings, 1917. Benn, 5s. net.

*Practical engineer*, July 26, 1917, p.41. ⅓ col.

"There are special sections devoted to electric power companies, and to colonial and foreign undertakings."

**Elhuff, Lewis.**

General science, first course. 433 p. Heath.

*General science quarterly*, May 1917, p.242. 1 p.

"Well written. The task of the teacher will be to select the material and adapt it to his own conditions." *C. M. Hall*.

**Ellms, Joseph Wilton.**

Water purification. 485 p. 1917. McGraw, \$5 net.

*Canadian engineer*, July 26, 1917, p.81. 1 col.

"Has attempted a broad account of the development of water purification. . . Is eminently practical, showing actual equipment photographs."

*Engineering news-record*, July 19, 1917, p.129. 1 col.

"Impresses one with its sincerity of purpose and reliability of data. It will be of invaluable assistance to the designer and operator of water-purification plants. A large part of the work is the result of the author's own experience. The remainder consists of quotations from published articles. . . Much of the material is new." *Robert Spurr Weston*.

*Municipal journal*, June 14, 1917, p.805. ⅔ col.

"To provide the reader with a fairly complete account of the development of the art of water purification. . . The arrangement of the descriptive matter in logical order, so that a clear idea may be had of each process. . . has been carried out very successfully, and the descriptions are full and clear without being profuse."

**Emery, W. D'Este.**

Clinical bacteriology and haematology for practitioners. Ed.5. 310 p. 1917. H. K. Lewis, 9s. net.

*Nature*, Aug. 2, 1917, p.443. ⅔ col.

"We can cordially recommend this book as on the whole a simple and reliable guide to clinical bacteriology and pathology."

**England—Advisory council for scientific and industrial research.**

Industrial research in the United States. 60 p. The Council, 1s.

*Journal of the Society of Chemical Industry*, June 30, 1917, p.630, 672. 1½ col.

"The present paper by A. P. M. Fleming has been prepared as a result of a visit paid last year by the author to the United States. Industrial research is classified according

**England—Advisory council—continued.**

to whether it is undertaken by manufacturing corporations, associations of manufacturers, universities and colleges, national institutions, commercial laboratories, or scientific societies."

**Evans, W. A.**

Dr Evans' how to keep well. 1,367 p. Appleton, \$3.

*American food journal*, Aug. 1917, p.439. ¾ col.

"Extremely inclusive. There are sixty-six chapters, and they cover every subject that comes under the general title of the book."

**Fallon, John T. ed.**

How to make concrete garden furniture and accessories. 105 p. McBride, \$1.50 net.

*Building age*, Aug. 1917, p.454. ½ col.

"In clear, concise language...Half-tone illustrations picture some of the excellent results which may be gained."

**Fantham, H. B. and others.**

Animal parasites of man. 900 p. 1916. Bale, 45s. net.

*Science progress*, July 1917, p.146. 4½ p.

"Well illustrated...There are a copious index and a bibliography of some length... The make-up of the book renders it easy of reading...Certainly should be most valuable to the student and should stimulate research into the many problems of parasitology that still need solution." *Annie Porter*.

**Faraday Society.**

Refractory materials; a general discussion held by the Faraday Society. 190 p. The Society, 12s. 6d.

*Brick and pottery trades journal*, July 2, 1917, p.150. ½ col.

"In this volume there is enough to give any ordinary manufacturer of firebricks plenty of material to think about."

**Farmer, F. Malcolm.**

Electrical measurements in practice. 359 p. McGraw, \$4 net.

*Electric railway journal*, July 7, 1917, p.44. ¼ col.

"Useful to anyone who has electrical testing to do, in furnishing him with several practical plans for making any desired measurement."

*Electrical world*, Aug. 18, 1917, p.312. ½ col.

"Excellent and timely text and reference book on electrical measurements from the industrial view point."

*Engineering news-record*, July 19, 1917, p.128. ½ col.

"The topics are presented from the practical standpoint of the tester. Descriptions of instruments and methods of employment alternate. The sections on power and energy measurements and on maximum demand and curve-drawing instruments are of conspicuous merit."

**Farming by motor. 95 p. Temple Press, 1s. 6d. net.**

*Practical engineer*, July 26, 1917, p.41. ½ col.

"Summarises concisely information on available types of agricultural tractors and motor ploughs, giving just the kind of information needed by prospective users."

**Farrar, Gilbert P.**

Typography of advertisements that pay. Appleton, \$2.25 net.

*Inland printer*, Aug. 1917, p.685. ½ col.

"Expert information on how to choose and combine type-faces, engravings and all other mechanical elements of modern advertising construction. The author discusses his subjects simply and to the point, and furnishes concrete examples throughout to demonstrate the value of the various factors in the mechanics of advertising."

*Publishers' weekly*, Aug. 18, 1917, p.572. ½ col.

"For the advertising man...or the business man who has to write occasional advertising copy...[it is] well-nigh indispensable."



**Faught, Francis Ashley.**

Blood-pressure from the clinical standpoint. Ed.2, thoroughly rev. 1916. Saunders, \$3.25 net.

*Saint Paul medical journal*, July 1917, p.228. ¼ col.

"This book, on a subject which we know so little about but which is attracting so much medical attention, is recommended to the medical profession." *C. B. Drake.*

**Fay, Henry.**

Microscopic examination of steel. 18 p. 1917. Wiley, \$1.25 net.

*Journal of industrial and engineering chemistry*, Aug. 1917, p.822. ¼ col.

"Originally issued by the Ordnance Department, U. S. A., and represented the work carried on at the Watertown Arsenal... It is not to be considered as a textbook, but is meant to present a mere outline of metallographic methods illustrating typical examples... Well worth while." *Ralph H. Sherry.*

**Fayol, Henri.**

Administration industrielle et générale; prévoyance, organisation, commandement, coordination, control. 174 p. 1917. Dunod & Pinat, Paris, 3 fr. 50.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.626. ⅜ p.

**Fernández Navarro, Lucas.**

Cristallografia fisica elemental. 329 p. 1917. V. Suarez, Madrid, 10 pesetas.

*Revue générale des sciences pures et appliquées*, June 30, 1917, p.377. ¼ col.

**Ficker, Nicholas Thiel.**

Shop expense analysis and control. 240 p. Eng. Mag., \$3.

*Machinery*, July 1917, p.1038. ¼ col.

*Railway review*, June 23, 1917, p.889. ¼ col.

"Author expressly disclaims having exhausted the subject of cost determination, having aimed rather at an exposition of some of the essential factors of the problem so as to enable the manufacturer to appreciate the scope of such work, at the same time giving valuable suggestions as to how to organize and classify shop activities with a view to efficient cost accountancy."

**Field, Clifton C.**

Retail buying. 220 p. Harper, \$1.25 net. (Harper's business series.)

*Publishers' weekly*, Aug. 18, 1917, p.574. ¼ col.

"The chapters on determining qualities of goods, determining prices and profits, the inventory, and instruction of salespeople are especially suggestive."

**Fischer, Martin H. & Hooker, M. O.**

Fats and fatty degeneration. 155 p. 1917. Wiley, \$2.

*Mining and scientific press*, Aug. 18, 1917, p.257. ⅔ col.

"The style... is so charmingly lucid and simple and the subject matter so intensely interesting to cultured men that we believe no student will be able to lay it down until he has read it to the last page."

**Fisher, Irving, & Fisk, E. L.**

How to live; rules for healthful living based on modern science. Ed.10, rev. 1917. Funk.

*Pennsylvania medical journal*, Aug. 1917, p.793. ½ col.

"The reviewer knows of no book on this subject better adapted for personal reading and study."

**Fisher, W. A.**

Cataract; senile, traumatic and congenital. 1917. Chicago Eye, Ear, Nose and Throat College, \$1.50.

*Saint Paul medical journal*, May 1917, p.164. ⅓ col.

"Especially interesting are the detailed reports of ninety-four consecutive operations performed by the author employing a modification of the Smith method... Should be a valuable addition to the library of every ophthalmologist." *Paul D. Berrisford.*

**Fisk, James W.**

Retail selling. 335 p. Harper, \$1 net. (Harper's business series.)

*Publishers' weekly*, Aug. 18, 1917, p.574.  $\frac{1}{2}$  col.

"Well written and arranged, abounds in concrete instances and cannot fail to be at least stimulating, if not actually suggestive."

**Flammarion, Camille, ed.**

Annuaire astronomique et météorologique pour 1917. 436 p. Flammarion, Paris, 2 fr.

*Astrophysical journal*, June 1917, p.356.  $\frac{1}{2}$  p.

"The fifty-third issue by the same editor... Well adapted to furnish inspiration for the amateur observer and general reader as well as to meet some needs of the more experienced astronomer." *V. M. G.*

**Fleming, A. P. M. & Pearce, J. G.**

Principles of apprenticeship training, with special reference to the engineering industry. Longmans, 3s. 6d. net.

*Electrical review*, July 13, 1917, p.33. 2 col.

"Economic aspect of education, and the relation of education to industry are very broadly and fairly discussed, and the arguments for and against vocational training are fully gone into... Deserves the careful study of manufacturers and educationalists." *F. B.*

**Foote, Charles E.**

Practical road building. 295 p. McKay, \$1.25.

*Good roads*, Aug. 4, 1917, p.63.  $\frac{1}{2}$  col.

"Intended... to meet the demand for an engineering work giving concrete, practical information on the subject in a form that may be readily understood by laymen, and uses, as far as possible, therefore, non-technical language."

**Fort, M. & Lloyd, L. L.**

Chemistry of dyestuffs. 311 p. Cambridge University Press, 7s. 6d.

*Journal of the Society of Chemical Industry*, June 30, 1917, p.672.  $\frac{1}{4}$  col.

"Quite suitable... as a manual for students of chemistry and dyeing."

**France—Bureau des longitudes.**

Annuaire pour l'an 1917. 661 p. 1916. Gauthier-Villars, Paris, 1 fr. 50.

*Astrophysical journal*, June 1917, p.355.  $\frac{1}{2}$  p.

"Devoted principally to astronomical tables and tables of measure and of meteorology. According to the plan adopted in 1904, it should contain also tables on geography and statistics. These have been omitted, together with those giving physical and chemical information." *E. W. W.*

*Bulletin de la Société d'Encouragement*, May-June 1917, p.630.  $\frac{1}{4}$  p.

*Electrician*, June 1, 1917, p.353.  $\frac{1}{2}$  col.

"Mainly of interest to astronomers and mariners, and in the present issue a very considerable section relating to physical and chemical data has been temporarily suppressed and replaced, seemingly, by others which refer to astronomy, spectroscopy, metrology... and meteorology."

**Franke, G.**

Handbook of briquetting; tr. by F. C. A. H. Lantsberry. 2v. v.1:

Briquetting of coals, brown coals and other fuels. 614 p. Lippincott.

*Coal age*, Aug. 18, 1917, p.290.  $\frac{1}{4}$  col.

"Reflects the briquetting industry as developed in Europe. It has nothing to say regarding American practice."

*Engineer*, June 15, 1917, p.545.  $\frac{1}{4}$  col.

"An epitome of German practice and illustrates and describes so far as we can see exclusively German briquetting factories and briquetting machinery."

*Nature*, May 24, 1917, p.242. 2 $\frac{1}{2}$  col.

"Entire work deals with the whole subject of briquetting as applied to a very wide range of materials, but the first part, the translation of which has now been issued is confined to the briquetting of coal... Within the limits in which he has chosen to confine himself the author has, however, done his work excellently well, and his book may fairly be regarded as a standard treatise." *H. L.*

**Fraps, C. S.**

Principles of agricultural chemistry. 507 p. 1917. Chemical, \$4.50.

*Ice and refrigeration*, July 1917, p.28.  $\frac{1}{3}$  col.

"Written so that any one of ordinary intelligence and education can understand what is given and utilize the instruction imparted...Should have a wide circulation."

**Frassetto, Fabio.**

Lezioni di antropologia. v.3. 422 p. 1917. Mareggiani, Bologna, 20 lire.

*Nature*, Aug. 2, 1917, p.444.  $\frac{1}{4}$  col.

"In his lectures dealing with the methods which are to be applied to the measurement of bones and to the exact estimate of their anthropological characters he has introduced much that is new and valuable." A. K.

**French, Roy L.**

Home care of consumptives. 224 p. 1916. Putnam.

*Journal of the Royal Sanitary Institute*, June 1917, sup. p.28.  $\frac{1}{3}$  p.

"Will be found exceedingly useful, helpful and encouraging by those for whom it is intended, viz., tuberculosis workers, nurses, teachers and social workers." C. P.

**Ganong, W. F.**

Text-book of botany for colleges. 401 p. 1916. Macmillan, 8s. 6d. net.

*Nature*, May 31, 1917, p.261. 1 col.

"The text makes easy reading, and is facilitated by a large number of good figures."

**Gardner, Henry A.**

Paint researches and their practical application. 384 p. Author, Washington, \$5.

*Painters magazine and paint and wall paper dealer*, June 1917, p.336.  $\frac{2}{3}$  col.

"We cannot too strongly urge those of our readers who are interested in technical paint matters to obtain a copy of this book and, after having read it carefully, to add it to their libraries for future reference."

**Garrard, A.**

Gas, oil and petrol engines. Whittaker, 5s. net.

*Electrical review (London)*, June 8, 1917, p.631.  $\frac{1}{2}$  col.

"Author has succeeded admirably in his main endeavor, which has been to enlighten not the cognoscenti, but the engineering student or apprentice and others engaged in engineering works or concerned in the running of internal combustion engines." G. S. S.

**Garrard, C. C.**

Electric switch and controlling gear. 656 p. Electrician, 15s. net.

*Electrical review (London)*, June 1, 1917, p.600.  $\frac{7}{8}$  col.

"Specialised work dealing with appliances and devices for the control and regulation of pressure and current, a subject in which the author has a very extensive experience...In addition to serving as a text-book to engineers and students generally, it can be recommended with every confidence as a reference book to central-station and transmission engineers and to those engaged in the manufacture of high-tension switchgear and machinery."

**Gear, H. B. & Williams, P. F.**

Electric central station distribution systems. Rev. & enl. ed. 457 p. Van Nostrand, \$3.50 net.

*Electric railway journal*, July 28, 1917, p.172.  $\frac{1}{2}$  p.

"There are many features of interest to electric railway engineers...Practical rather than theoretical, but fundamental principles are cited when necessary...Much first-hand information as to the merits of certain schemes and practices...A convenient handbook in its particular field."



**Gibbs, Winifred Stuart.**

Minimum cost of living. 93 p. 1917. Macmillan, \$1.

*Journal of home economics*, July 1917, p.343. 1¼ col.

"A study of families of limited income in New York City...Seventy-five families out of 150 studied are chosen as representative...These budgets were not the result of one season's work; for several years the families in question had been advised and helped in the proper distribution of the income over their needs...The financial history of these families is given in great detail."

*Science*, July 6, 1917, p.18. ¾ col.

"Income and expense accounts of seventy-five families receiving charitable aid, in the form both of advice and of money, were analyzed. A food allowance made up from twenty-two items in quantities calculated to suffice for the maintenance of the family, as constituted, gave very successful results...The 'unit' of value for food per 'man' per day was taken at 3,000 calories and cost on October 1, 1916, thirty-four cents." *Graham Lusk*.

**Gillette, Halbert Powers.**

Handbook of clearing and grubbing methods and cost. 232 p. 1917.

Clark Bk. Co. Inc., \$2.50 net.

*Canadian engineer*, Aug. 30, 1917, p.188. ½ col.

"Tried methods, which deal with a class of work which is one of the most important parts of the contracting field as pertaining to works carried forward in bush or semi-bush country."

*Engineering news-record*, Aug. 16, 1917, p.323. ½ col.

"A collection of previously published information."

**Gina, Michele, & Gina-Lollini, Clara.**

Combinazioni chimichi fra metalli. 446 p. Hoepli, Milan, 12. 50 lire.

*Journal of the Society of Chemical Industry*, July 16, 1917, p.738. ½ col.

"Gained the prize offered in 1915 by the *Reale Istituto Lombardo di Scienze e Lettere* for the best monograph on 'Intermetallic compounds.'"

**Girard, L. & Lauriol, P.**

Instruction pratique pour la détermination du pouvoir calorifique du gaz. 18 p. 1917. Gauthier-Villars, Paris.

*Revue générale des sciences pures et appliquées*, May 15, 1917, p.281. ½ col.

**Gisholt Machine Company.**

Gisholt turret lathe guide. 254 p. The Company, Madison, Wis. \$1.

*American machinist*, Aug. 9, 1917, p.262. ½ col.

"In no sense a catalog. It is a compendium of useful information for the user of this well known type of machine tool and contains a great number of valuable suggestions, both as to manipulation and tooling."

*Railway mechanical engineer*, June 1917, p.288. ¼ col.

**Glazebrook, Richard T.**

Science and industry; the place of Cambridge in any scheme for their combination. 51 p. 1917. Cambridge University Press, 1s. 6d. net.

*Nature*, July 26, 1917, p.423. ¼ col.

"We hope the essay will be widely studied, dealing as it does with matters of the highest importance which must be handled boldly if the future welfare of the nation is to be assured."

**Gley, E.**

Internal secretions; tr. by Maurice Fishberg. 241 p. 1917. Hoeber, \$2.

*American journal of public health*, June 1917, p.573. ¼ p.

"Is not a simple summary of the accepted facts regarding the endocrine organs and their functions. It is, rather, a thoughtful critique upon some of the current conceptions." *Percy G. Stiles*.

**Goudie, William J.**

Steam turbines; a text-book for engineering students. 520 p. 1917. Longmans, 12s. 6d.

*Engineer*, June 1, 1917, p.503. 1½ col.

"Quite an excellent treatise... The author has taken the greatest pains to obtain his data from the most reliable and recent sources. We have every confidence in recommending it to students and designers."

**Grahame-White, Claude, & Harper, H.**

Air-power; naval, military, commercial. Chapman & H., 7s. 6d. net.

*Engineering review*, June 15, 1917, p.376. 1½ col.

"Does not tackle the international political part of the subject... The authors did not intend to treat the subject in too technical a manner; but, naturally, it cannot be avoided... Is divided into seven parts, as follows:— 1. The War by Air. 2. Problems in Construction. 3. Our Policy after the War. 4. Factors of Safety. 5. Popularising travel by Air. 6. Laws of the Air. 7. The Commercial Era of Flight." *D.*

**Gramont de Guiche, A. de.**

Exposé élémentaire des connaissances générales utiles aux aviateurs. 103 p. 1917. Lahure, Paris, 1 fr. 50.

*Revue générale des sciences pures et appliquées*, June 15, 1917, p.346. ½ col.

**Greene, Carleton.**

Wharves and piers; their design, construction and equipment. 248 p. 1917. McGraw, \$3 net.

*Engineering news-record*, Aug. 16, 1917, p.325. ½ col.

"Frankly a catalog of standard designs. There appears little attempt to expand theory, but as a catalog, using that word in its best sense, there is little to be wished for."

*International marine engineering*, Aug. 1917, p.366. 1½ col.

"May be called the first book of its kind published in the United States... On the whole, it may be said that the book is satisfactory, especially that part which refers to retaining walls and superstructures."

**Grierson, R.**

Some modern methods of ventilation. 187 p. Van Nostrand, \$3 net.

*Electrician*, July 6, 1917, p.546. 1 col.

"Author has had clearly in mind a very definite object when writing the book, viz., to help those who in practical life have to deal with the problem of ventilation... and he has filled the bill very well... Of sound practical value." *J. Wemyss' Anderson.*

*Engineering news-record*, June 21, 1917, p.602. 1½ col.

"Although the book will scarcely meet the needs of the student beginner in this subject, nor completely satisfy the needs of the well-informed engineer, yet it may well interest both and it is a desirable addition to any library on the subject of ventilation. The descriptions and definitions are models of conciseness and clearness." *R. D. Kimball.*

*Journal of the American Society of Heating and Ventilating Engineers*, April 1917, p.464. 1 p.

"A notable addition to existing literature on ventilation."

**Griffiths, Harry D.**

Bucket-dredging for tin in the federated Malay states. 40 p. Mining Magazine, London, 5s.

*Mining magazine*, June 1917, p.320. ½ col.

"Discusses the design of dredges, gives the results of operations, and demonstrates future possibilities."

**Grunsky, Carl Ewald, & Grunsky, C. E. jr.**

Valuation, depreciation and the rate-base. 387 p. 1917. Wiley, \$4 net.

*Journal of the American Society of Mechanical Engineers*, July 1917, p.682. 1 col.

"Will be helpful to advanced engineers and appraisers... Probably too far advanced to be used as a textbook for students." *Chas. T. Main.*

**Guide du soudeur et les applications de l'oxygène.** Ed.10. 260 p. 1917. l'Oxyhydrique, Paris.

*Bulletin de la Société d'Encouragement*, March-April 1917, p.444. ¼ p.

**Gurtu, S. K.**

Flood-absorption in tanks. Ed.3. 82 p. 1917. Alijah Darbar Press, Gwalior, India.

*Scientific American*, July 14, 1917, p.36. ¼ col.

"Engineers interested in the design of surplus works for reservoirs will find in it researches and methods of practical application that will be very useful. Formulas and tables are given for finding the absorption-capacity of reservoirs, which may result in considerable economy through the reduction in length of waste weirs."

**Guyer, Michael.**

Animal micrology; practical exercises in zoological micro-technique. Rev. & enl. ed. 300 p. 1917. Univ. of Chicago Press, \$2 net.

*Scientific American*, June 16, 1917, p.604. ¼ col.

"Will be welcomed by both teachers and individual workers, offering, as it does, a service of wide scope... Every statement is clean-cut, its meaning unmistakable."

**Halsey, Frederick A.**

Handbook for machine designers, shop men and draftsmen. Ed.2. 561 p. McGraw, \$5.

*Engineer*, June 15, 1917, p.545. ⅓ col.

"We should be glad to see more works of the same kind, each devoted to some special subject, and dealing with it in the same thoroughly practical 'draftsman's' way. We have only one very small criticism to make. The tendency of all authors of volumes of this kind is, if we dare venture to put it quite bluntly, to be too thorough. They try to include too much."

*Iron age*, Aug. 23, 1917, p.456. ¾ col.

"The second edition has lifted the high standard attained in the first to a still higher plane, and it may safely be said that the book is indispensable to every designer and user of metal-working machinery."

**Harding, Louis Allen, & Willard, A. C.**

Mechanical equipment of buildings. v.1-2. Wiley.

v.1: Heating and ventilating. 615 p. \$4 net.

v.2: Power plants and refrigeration. 759 p. \$5 net.

*Canadian engineer*, Aug. 30, 1917, p.188, (review of v.2). ¾ col.

"The second of a series of three volumes... The work forms a reference book for engineers, and all available sources of information relating to this field of engineering have been drawn upon, so that the work is on a comprehensive scale."

*Concrete*, June 1917, p.244, (review of v.1). ¾ col.

"The present volume deals entirely with heating and ventilating appliances, while subsequent volumes are planned which will deal with other mechanical building accessories... Not only have text-books been utilized but the immense amount of valuable data contained in manufacturers' literature has been thoroughly digested and made use of where found available."

*Engineering news-record*, July 19, 1917, p.130, (review of v.2). ½ col.

"Admirably supplements the first volume... Every engineer and student interested in power-plant work will find this volume a desirable acquisition." *D. D. Kimball*.

*Heating and ventilating magazine*, July 1917, p.51, (review of v.2). ¾ col.

"Several of the chapters appearing in Volume 1 have been reprinted, including the chapters on heat, water, steam and air, and fuels and combustion. The new volume is modeled on the same broad lines as Volume 1. Manufacturers' data, which have been found useful and reliable, are presented in detail, supplementing the authors' own voluminous data."

*Ice and refrigeration*, Aug. 1917, p.69, (review of v.2). ½ col.

"Is devoid of argument or discussion, the subject matter being confined to brief statements of facts, formulas and data of value to the power plant and refrigerating engineer or to the advanced student of these subjects."

*Journal of the American Society of Heating and Ventilating Engineers*, April 1917, p.463, (review of v.1). 1½ p.

"Intended as a reference work for engineers and architects, containing sufficient theoretical and commercial data for practical use in the designing room, but at the same



**Harding, Louis Allen, & Willard, A. C.—continued.**

time will serve to show the student of this subject the relation between the theoretical principles involved and their practical application to actual problems."

*Journal of the American Society of Heating and Ventilating Engineers*, July 1917, p.641, (review of v.2). 1 p.

"Will be welcomed for its concise presentation of important data concerning power plant work."

*Machinery*, July 1917, p.1,038, (review of v.2). ¼ col.

"A reference book for building engineers and architects, and is the second part of the treatise, though complete in itself. In order to make Vol. II complete, the chapters on heat, water, steam, air, fuels and combustion, and parts of two other chapters were reprinted from Vol. I."

*Power*, Aug. 14, 1917, p.238, (review of v.2). 1½ col.

"The reviewer is glad to say this is one of the best books dealing with power-plant engineering that he has had the pleasure of reviewing."

**Harris, Elmo G.**

Compressed air; theory and computations. Ed.2, rev. & enl. 192 p. McGraw, \$2.

*American machinist*, Aug. 30, 1917, p.394. ½ col.

"This, the second edition, has been prepared with the view to eliminate all errors and ambiguities and to add matter of value where possible without burdening the text with illustrations and descriptive matter of only temporary value."

*Compressed air magazine*, July 1917, p.8,444. ¼ col.

"An ideal book for college use. For the student of compressed air theory and for the seeker of precision in practice it is indispensable. . . There is a new chapter on centrifugal fans and turbo compressors and an appendix on the designing of logarithmic charts."

*Machinery*, July 1917, p.1,038. ½ col.

"This excellent work, which was first published in 1910, now appears in a second edition. It gives in comparatively few pages many formulas and a large amount of technical data on compressed air engineering."

*Power*, July 3, 1917, p.33. ½ col.

"A mathematical treatise throughout, the author making use of the calculus where necessary. . . A very complete theoretical compendium on compressed air."

**Harrison, C. S.**

Evergreens; how to grow them. 95 p. Webb Pub.

*American forestry*, June 1917, p.374. ¼ col.

"Written chiefly to aid the farmers of the prairie States in the selection and care of evergreens which will produce lumber, prevent erosion, and beautify the treeless landscape."

**Hausbrand, E.**

Evaporating, condensing and cooling apparatus; tr. from 2d. rev. German ed. by A. C. Wright. 2d. English ed. 401 p. Scott, Greenwood, \$5 net.

*India rubber world*, July 1917, p.592. ½ col.

"This authoritative work by the chief engineer of C. Heckmann, Berlin. . . is of exceptional value to engineers because of its table of coefficients giving positive answers to all questions ordinarily arising."

*Industrial management*, July 1917, p.622. 1 col.

"A great deal of data. . . on the heating effects of steam at different pressures and temperatures, but from the theoretical side only. The questions have been treated strictly from the laboratory standpoint, and while almost every possible problem that would have to be met by the engineer has been treated, its application to work on a manufacturing scale is not so evident to the reader."

**Hausmann, Erich.**

Telegraph engineering. Constable, 12s. 6d.

*Engineer*, July 6, 1917, p.15. ¼ col.

"For electrical engineering students, and as a reference book for practising telegraph and telephone engineers, and for others engaged in the arts of electrical communication. . . The matter is wholly American."

**Hays, Joseph W.**

How to build up furnace efficiency; a handbook of fuel economy. Ed. 10. 158 p. Author, Chicago, \$1.

*Chemical engineer*, July 1917, p.179. ½ col.

"Designed to interest readers with no technical training and it succeeds admirably in its purpose."

*India rubber world*, Aug. 1917, p.657. ¼ col.

"In the words of the author, the book consists of five reels, including a few snorts about industrial efficiency and other things, together with an appendix devoted to oils, gas, wood refuse and other fuels. . . The five reels tell pointedly and in graphic fashion why and how fuel is wasted, how to spot and stop these wastes, and how to keep them stopped."

*National engineer*, July 1917, p.299. ½ col.

"Since the publication of the last American edition it has been published in Great Britain and Norway and translations are being made preliminary to the publication of a Spanish edition. . . For the non-technical man who wants a thoroughly practical book on furnace efficiency and combustion there is probably nothing better published."

**Heath, George L.**

Analysis of copper and its ores and alloys. 292 p. McGraw, \$3.

*Engineering and mining journal*, June 16, 1917, p.1,083. ¼ col.

"Covers the sampling, analysis and assay of ores, furnace products, rough and refined copper and copper alloys, with special chapters on metallography and resistivity testing. . . By far the best available work on this subject, but falls considerably short of being the best that can be written."

**Hedley, C. See Australasian Antarctic expedition, 1911-14.****Heiner, R. G.**

Physiology, first aid and naval hygiene; a text book for the Department of Naval Hygiene and Physiology at the U. S. Naval Academy, Annapolis, Maryland. 139 p. 1916. U. S. Naval Inst., \$1.

*Social hygiene*, July 1917, p.378. 3¼ p.

**Hessler, John C.**

First year of science. 484 p. Sanborn.

*General science quarterly*, May 1917, p.243. 1 p.

"Has given very acceptable service in the classes of the writer." *M. Marcus Kiley*.

**Higgins, A. Lovatt.**

The slide rule; its operations and digit rules. 13 p. 1917. Whitaker, 4d.

*Boiler maker*, Aug. 1917, p.232. 4 l.

"Explaining the operation of slide rules and their application to mathematical problems."

**Higgins, Lothrop D.**

First science book; physics and chemistry. 237 p. Ginn.

*General science quarterly*, May 1917, p.244. ¾ p.

"The method of the author is to begin with the simplest and progress logically to the more complex, as: elements, compounds, mixtures, common chemical processes, etc." *W. G. Vinal*.

**Higgins, S. H.**

Dyeing in Germany and America, with notes on colour production. Ed. 2, enl. 143 p. 1916. Longmans, 5s. net.

*Nature*, June 14, 1917, p.303. 1 col.

"In a new chapter the German and English methods of manufacturing flannelettes are contrasted. . . The author. . . has also added a new chapter on 'Instruction in Dyeing' . . . With regard to trade research, it is pointed out that the amount actually carried on must not be gauged by publications in technical journals." *W. M. G.*

**Hill, Lewis Webb, & Eckman, R. S.**

The starvation (Allen) treatment of diabetes. Ed.3. 1917. Leonard, \$1.25.

*Saint Paul medical journal*, July 1917, p.228. ½ col.

"Leaves the impression that fasting is suitable in all cases and that two or three days starvation will usually make a patient sugar-free. Many of us, I think, have found it not so easy as that." *Alfred Hoff*.

**Hirschberg, Charles A.**

Compressed air for the metal worker. 315 p. Clark Bk. Co. Inc., \$3.

*Blast furnace and steel plant*, Sept. 1917, p.436. ½ col.

"From the practical standpoint, this book very ably covers the uses of compressed air."

*Industrial management*, July 1917, p.622. ½ col.

"One of the best reviews that has come to our notice on the use of compressed air in the working of metals. Almost every metal working industry is mentioned at least briefly, and a large number of excellent half-tones show its use in shops in a great variety of applications."

**Holmes, S. J.**

Studies in animal behavior. 266 p. 1916. Badger, R. G., \$2.50.

*Nature*, May 24, 1917, p.243. 1 col.

"Vividly interesting, and while the author flies a number of kites, he is careful to distinguish between fact and theory... A distinctive feature of his method is the combination of analytic and genetic inquiry." *J. A. T.*

**Hoover, T. J.**

Concentrating ores by flotation. Ed.3. 320 p. 1916. Mining and Scientific Press, \$3.75.

*Journal of the Society of Chemical Industry*, May 15, 1917, p.522. ½ col.

"Text of the second edition has been retained in its entirety, and a chapter on recent progress has been added to bring the matter up to date... The bibliographies and lists of patents are very complete."

**Horwood, C. Baring.**

Gold deposits of the Rand. 436 p. Griffin, \$5.

*Mining and scientific press*, July 28, 1917, p.20. ¾ col.

"Re-print... of the series of articles contributed to the Mining and Scientific Press during 1913, together with the exhaustive discussion that ensued... We commend this volume to all students of ore deposition, and particularly to mining engineers." *T. A. R.*

*Mining magazine*, July 1917, p.6, 45. 1 ¼ p.

"It is not possible for us to do more than indicate the chief arguments and to encourage readers to study the book closely."

**Hotchkin, W. R.**

Making more money in storekeeping. 364 p. Ronald, \$3 net.

*Publishers' weekly*, Aug. 18, 1917, p.574. ½ col.

"The book isn't specific, and after all just what the other fellow is actually doing is a lot more valuable to a merchant than... platitudes."

**Houston, A. C.**

Rivers as sources of water-supply. 96 p. 1917. Bale, 5s. net.

*Nature*, June 7, 1917, p.282. 1 col.

Deals with London water-supply. •

**How to lay-out turret lathe tools; a handbook for those who design tools for use on capstan and turret lathes and automatic turning machines.** 135 p. Alfred Herbert, Coventry, 2s. 6d.

*Engineer*, June 29, 1917, p.591. ½ col.

"Although this is a 'trade' book, in the sense that it is published by a manufacturing firm and deals principally with the products of that firm, it is in no sense a catalogue, and is, as it calls itself, a 'handbook'... We are confident that whilst this little volume



**How to lay-out turret lathe tools—continued.**

will be welcomed particularly by firms using Herbert lathes, it will be appreciated for its sound shop sense by all managers."

*Engineering*, June 1, 1917, p.514.  $\frac{3}{4}$  col.

"A most valuable addition to the library of the mechanical engineer... Is from beginning to end full of sound practical information clearly stated, and dealing with many points of workshop practice concerning which little of real value has hitherto been written."

*Engineering review*, April 16, 1917, p.312.  $\frac{1}{2}$  col.

"For those engineers without previous experience of turret lathes, who have installed them for munition purposes, the book will be a helpful guide when the time comes for turning the lathes to other uses."

*Ironmonger*, June 2, 1917, p.45.  $\frac{1}{4}$  col.

"Ought to be in the tool room of every shop where the exigencies of war output have led to the fixing of one or more capstan and turret lathes... There is a useful section at the end devoted to materials used in tool work."

*Machinery*, July 1917, p.1,038.  $\frac{1}{4}$  col.

"A practical book."

*Practical engineer*, June 14, 1917, p.283.  $\frac{1}{3}$  col.

"This is described as 'a handbook for those who design tools for use on turret and capstan lathes and automatic turning machines,' but it is much more than that, for it describes the machines and how they are used."

**Howard, L. O. and others.**

Mosquitoes of North and Central America and the West Indies. 4v. 1915-17. Carnegie Institution of Washington.

*Science*, June 22, 1917, p.637.  $3\frac{3}{4}$  col.

"The final part of this great work has at last been issued, amid general rejoicings from those interested in medical entomology, since it contains a full account of the malaria-organism carrier, Anopheles." *T. D. A. Cockerell*.

**Howe, E. C.**

Syllabus of personal hygiene for colleges. 3d revision. 207 p. Author, Wellesley, Mass.

*Nature*, July 12, 1917, p.382.  $\frac{1}{4}$  col.

"Divided into thirty lectures... The subjects seem to be well chosen and the treatment of them satisfactory."

**Hubert, Henry.**

Mission scientifique au Soudan. 319 p. 1916. Larose, Paris, 15 fr.

*Revue générale des sciences pures et appliquées*, May 15, 1917, p.282.  $1\frac{1}{4}$  col.

**Hudson, Ralph G. and others.**

Engineers' manual. 310 p. 1917. Wiley, \$2 net.

*Canadian engineer*, Aug. 30, 1917, p.189.  $\frac{1}{2}$  col.

"Should prove invaluable to the practising engineer as a time-saver and as an aid to the memory."

**Hungerford, Edward.**

The railroad problem. 261 p. McClurg, \$1.50.

*Electric railway journal*, July 14, 1917, p.88.  $\frac{1}{2}$  col.

"Careful study of the physical and financial plight that has overtaken the railroads, and the cause thereof... Perhaps the chapter of most interest to men in the electric railway industry is the one on 'The Opportunity of the Railroad.'"

**Hurley, Edward N.**

Awakening of American business. 241 p. Doubleday, \$2 net.

*Publishers' weekly*, Aug. 18, 1917, p.573.  $\frac{3}{4}$  col.

"Coming... from a business man of unquestioned ability... it naturally commands the attention of forward-looking business men... As a book it is a poor piece of manufacturing for the money but that does not detract in the slightest from the vitality of its message."

**Husband, Joseph.**

Story of the Pullman car. 161 p. McClurg, \$1.50.

*Railway age gazette*, July 6, 1917, p.4.  $\frac{1}{4}$  col.

"History of the sleeping car from its origin to the present day, giving particular attention to the life and work of the late George M. Pullman and the growth of the Pullman Company."

**Hutchison, Robert.**

Food and the principles of dietetics. Ed.4, thoroughly revised. 617 p. Wood, \$4.

*American food journal*, Aug. 1917, p.440.  $\frac{5}{8}$  col.

"The first edition was published in 1900, and since that time no library that makes any pretense of being complete in the subject of dietetics has been without this book."

**Hutson, A. C.**

Fire prevention and protection. 780 p. 1916. Spectator, \$4.25.

*American industries*, Aug. 1917, p.42.  $\frac{3}{4}$  col.

"Valuable addition to the library of all engineers and students interested in the conservation of life and property from fires and conflagrations."

**Hutt, C. W.**

Crowley's hygiene of school life. 428 p. Methuen, 3s. 6d. net.

*Nature*, July 12, 1917, p.382.  $\frac{1}{4}$  col.

**Illuminating Engineering Society.** See **Pennsylvania University.**

**Innes, Charles H.**

The fan, including the theory and practice of centrifugal and axial fans. Ed.2, rev. Tech. Pub. Co., 8s. 6d. net.

*Engineering*, June 1, 1917, p.513.  $1\frac{7}{8}$  col.

"Since this book was published in 1904 the fan has assumed new forms and found useful application in many directions. Its more varied use has led to increased inquiries concerning its design and efficiency, and a new work would probably have been preferable to this extension."

**International Institute of Agriculture.**

Le mouvement international des engrais et produits chimiques utiles à l'agriculture. 72 p. 1917. The Institute, Rome, 1 fr. 50.

*Moniteur scientifique*, June 1917, sup. p.46; July 1917, sup. p.55.

**International Motor Institute.** See **Official auto wiring guide.**

**James, W. H. N.**

Alternating currents in theory and practice. 353 p. Cambridge University Press, 10s. 6d. net. (Cambridge technical series.)

*Electrician*, June 1, 1917, p.353.  $1\frac{1}{8}$  col.

"Contains an account of the fundamental principles of the alternating-current circuit, as well as a fair amount of matter on machines, and, although there is little that is novel, the arrangement of the book is good and the reasoning is clear to the well grounded beginner."

**Janet, P.**

Leçons d'électrotechnique générale. 2v. v.1, 450 p. v.2, 421 p. Gauthier-Villars, Paris, 26 fr.

*Revue générale de l'électricité*, July 14, 1917, p.42.  $\frac{3}{8}$  col.

**Jansky, Cyril M.**

Electrical meters. Ed.2. 416 p. McGraw, \$3 net.

*Electrical age*, July 1917, p.41.  $\frac{1}{4}$  col.

"We have no hesitation in recommending it for every meter department and power-

**Jansky, Cyril M.—continued.**

plant library, and as a text-book in central station courses on electrical metering."

*Electrical record*, Aug. 1917, p.78. ½ col.

"An authentic treatise on one of the most precise phases of electrical work."

*Electrical review (Chicago)*, Aug. 11, 1917, p.243. ¾ col.

"Thorough and quite complete treatise on instruments for measuring electricity...

Subject is treated entirely from an engineering and not from a historical standpoint... Not sufficiently complete to constitute a manual for the practical operation of meters and instruments, and evidently... not prepared with this in view... A valuable reference work." *O. J. Bushnell.*

*Electrical world*, Aug. 25, 1917, p.360. 1 col.

"During the four years since the first edition appeared many new developments have been made, hence much new material has been added and obsolescent matter has been cut out."

**Jansky, Cyril M. & Faber, D. C.**

Principles of the telephone. v.I: Subscriber's apparatus. 160 p. Hill Pub. Co., 6s. 3d. net.

*Electrician*, Aug. 3, 1917, p.702. ¾ col.

"Intended to be used by students, and at the same time to appeal to men actively engaged in the installation, care and operation of telephone apparatus... Omissions will be felt by those British readers who have passed beyond the most elementary studies." *W. H. Grinstead.*

**Jessup, W. A. & Coffman, L. D.**

Supervision of arithmetic. 225 p. 1916. Macmillan, 5s. net.

*Nature*, June 21, 1917, p.322. 1 col.

"We are likewise at a loss to conjecture for whose benefit the tables are compiled, seeing that elaborate explanations are attached to so many that carry on the face of them their meaning. It is not always easy to see the object of some of the investigations—e. g. what is the point in a table showing the order of teaching the multiplication table in cities according to their population?" *W. J. G.*

**Jeter, S. F.**

Riveted boiler joints; a treatise on the design of boilers and riveted boiler joints, with numerous original diagrams enabling the designer to design any desired joint without calculations. 155 p. 1917. McGraw, \$3 net.

*Boiler maker*, June 1917, p.172. ¾ col.

"A new and convenient method of determining by means of diagrams the strength of riveted boiler joints in practically any combination of plate thicknesses and rivet diameters. The diagrams, of which there are seventy-six, represent an entirely new treatment of the subject of calculating the strength of riveted seams."

**Johnson, J. E. jr.**

Blast-furnace construction in America. 415 p. McGraw, \$4.

*Engineering news-record*, July 19, 1917, p.129. ¾ col.

"Engineers and furnace men engaged in building and rebuilding blast furnaces will be benefited by reading Mr. Johnson's book... It treats the construction of plant and equipment, from the handling of raw materials to the finished product... Valuable contribution to the literature of the subject." *Charles E. Lehr.*

**Jones, Ernest, & Griffith, A. J.**

Chemistry for rural schools. 184 p. 1916. Blackie, 2s. 6d. net.

*Nature*, May 17, 1917, p.223. ½ col.

"To make the book serve not only as a foundation for the study of pure chemistry, but also as an introduction to agricultural chemistry, the authors have included chapters on assimilation by plants, on proteins and animal nutrition, on fermentation, and on the constituents of soil." *C. S.*



**Jordan, Edwin Oakes.**

Food poisoning. 115 p. 1917. Univ. of Chicago Press, \$1.

*American food journal*, June 1917, p.331. ¼ col.

"In the main this book is well deserving of the highest praise."

*American journal of public health*, Aug. 1917, p.713. ⅝ p.

"Written in good English in an entertaining and concise manner." *Hermann C. Lythgoe.*

**Judge, Arthur W.**

High speed internal combustion engines. 350 p. Whittaker, 15s. net. (Specialists' series.)

*Engineering review*, June 15, 1917, p.377. 1½ col.

"A wealth of well-arranged and up-to-date information relating to the theory of high speed internal combustion engines, and the means and methods available for their experimental investigation." *R. E. Neale.*

*Practical engineer*, June 14, 1917, p.283. ¾ col.

"Author has aimed at collecting and classifying, in as brief a form as possible, the more important information relating to high speed internal combustion engines as viewed from the theoretical and practical sides. In this we think he has attained a large measure of success, and the work should be found very useful."

**Judge, Arthur W.**

Properties of aerofoils and aerodynamic bodies. Whittaker, 15s. net.

*Engineer*, Aug. 3, 1917, p.101. ⅝ col.

"Chief value of the book undoubtedly lies in the collection and co-ordination of the various experimental results."

**Kapp, Gisbert.**

Principles of electrical engineering and their applications. v.1. E. Arnold, 15s. net.

*Electrical review (London)*, June 1, 1917, p.600. 1½ col.

"By no means a book to be lightly treated, but, at the same time, there is no reason for the prospective reader, who is assumed to have had an education involving at least a nodding acquaintance with higher mathematics, to be dismayed; although the theory is mathematically treated, all steps are carefully set out, so that there should be no difficulty in following the reasonings. As the volume in question, being the first of two, deals with principles only, it must not be expected that the contents may be digested save at the expense of time."

**Kaye, G. W. C.**

X-rays. Ed.2. 285 p. 1917. Longmans, \$3 net.

*Astrophysical journal*, June 1917, p.354. 1½ p.

"The writer...has subjected the book to a thorough revision and incorporated original work of note published up to the middle of 1916." *E. C. Watson.*

*Nature*, May 17, 1917, p.225. ½ col.

*Transactions of the Faraday Society*, June 1917, p.326. ⅝ p.

"In spite of its modest bulk, it cover most comprehensively the theoretical and experimental as well as what might be called the professional aspects of the subject."

**Kehl, Robert J.**

Oxy-acetylene welding practice; a practical presentation of the modern processes of welding, cutting, and lead-burning, with special attention to welding-technique for steel, cast-iron, aluminum, copper, and brass. 102 p. 1917. Am. Technical Soc., \$1.

*Mining and scientific press*, June 30, 1917, p.936. ½ col.

"Describes with the aid of a multitude of photographs and diagrams the entire technique, so that it becomes a guide-book from which one might teach himself the art."

*Railway and locomotive engineering*, Aug. 1917, p.277. ½ col.

"Illustrations are of particular interest as furnishing complete details from the simplest operations to the more intricate details of complicated work, so that the work

**Kehl, Robert J.—continued.**

is not only adapted for the use of engineers, but will be found to be useful to those who are more advanced in the welder's art."

*Welding engineer*, July 1917, p.42. ½ col.

"With index, covering every phase of welding. The illustrations are profuse and will prove of great service to the novice."

**Kelly's** directory of the merchants, manufacturers and shippers of the world. Kelly's Directories.

*Engineer*, June 22, 1917, p.570. ½ col.

"All reference to enemy countries—Germany, Austria-Hungary, Turkey, and Bulgaria—has been omitted. . . We are assured in the preface that the usual care has been bestowed on the task of revising the hundreds of thousands of references contained."

*Iron and coal trades review*, June 1, 1917, p.637. ½ col.

**Kelsey, Carl.**

The physical basis of society. 406 p. 1916. Appleton.

*Science*, Aug. 31, 1917, p.215. 2 col.

"Gives all appearances of having been too hastily written." *F. Stuart Chapin.*

**Kempe, H. R.**

Alternating currents; their elements explained and their calculation effected without the use of hyperbolic functions. Lockwood, 3s. 6d. net.

*Electrical review (London)*, May 25, 1917, p.571. ¾ col.

"In recommending the book to all students who are approaching the subject of alternating currents, we would congratulate the author on the consistency of method which has characterised his work from the first contributions. . . right up to the present time." *A. F.*

**Kennan, George.**

The Salton sea; an account of Harriman's fight with the Colorado river. 106 p. Macmillan, \$1.

*Engineering news-record*, Aug. 16, 1917, p.325. ½ col.

*Railway age gazette*, July 6, 1917, p.4. ½ col.

"The accurate account which Mr. Kennan now publishes. . . is as intensely interesting as any novel. . . It ought to have a very wide circulation."

**Kennard, Beulah E. ed.**

Department store merchandise manuals: stationery dept.; jewelry dept.; notions dept.; cotton and linen dept.; leather goods dept.; others to follow. About 125 p. ea. Ronald, \$1.25 net, each.

*Publishers' weekly*, Aug. 18, 1917, p.574. ½ col.

"In no sense scholarly treatises but rather elementary practical manuals for sales-people. They will undoubtedly earn thru increased selling intelligence many times their modest cost to the store owner who passes them along to his assistants."

**Kent, William, & Kent, R. T.**

Mechanical engineers' pocket-book. Ed.9. Chapman & H., 21s. net.

*Electrical review (London)*, July 13, 1917, p.33. ¾ col.

"The only true test of a work of this kind is that of use, and. . . we can testify to its value as a desk companion. . . Not a guide to the novice, but a companion to the practical engineer."

**Kerley, Charles Gilmore.**

What every mother should know about her infants and young children. Hoeber, \$.35.

*American journal of nursing*, Aug. 1917, p.1,142. ½ col.

"Brief though complete."

**Kerr, G. L.**

Elementary coal mining. Ed.4. 225 p. Griffin, 3s. 6d. net.

*Practical engineer*, June 14, 1917, p.283.  $\frac{1}{4}$  col.

"To meet the requirements of students attending classes in coal mining and of miners and others engaged in practical work." Starting with a brief consideration of the sources and nature of coal, it takes the reader through the whole business of exploration, boring and winning the mineral, discusses explosives and their use, methods of working (including pumping, ventilation, and lighting), and machinery."

**Keyser, Cassius J.**

The human worth of rigorous thinking. 314 p. 1916. Columbia University Press, \$1.75.

*Science*, Aug. 24, 1917, p.186.  $2\frac{3}{4}$  col.

"Highly recommended for the prospective teachers of mathematics, as well as for those who are interested in the general cultural values of various scientific subjects." *G. A. Miller*.

**Kidder, F. S.**

Triangulation applied to sheet metal pattern cutting. 272 p. 1917. Sheet Metal Pub. Co., \$2.50.

*Boiler maker*, Aug. 1917, p.232.  $\frac{1}{4}$  col.

"The problems explained...are thoroughly practical problems, and cover the kind of work which the layout ordinarily has to perform."

*Sheet metal*, Aug. 1917, p.163.  $\frac{3}{4}$  col.

"Will come as a welcome help to the sheet metal pattern cutter and student."

**Kingzett, C. T.**

Chemistry for beginners and for use in primary and public schools. 106 p. 1917. Baillière, 2s. 6d. net.

*Chemical news*, June 1, 1917, p.263.  $\frac{1}{2}$  col.

"It appears rather doubtful whether the material is put before the pupil in such a way as to make him use his reasoning power...The third part...is packed much too full of facts which will stand very little chance of being properly assimilated. Nevertheless, for the general reader who is interested in chemistry, the book will provide a useful review of the chief facts."

*Nature*, July 26, 1917, p.422.  $\frac{1}{2}$  col.

"Scarcely a book for the young scientific tyro." *J. B. C.*

**Kitson, Arthur.**

Trade fallacies. P. S. King & Son Ltd., 5s. net.

*Journal of the Royal Society of Arts*, June 15, 1917, p.540.  $1\frac{1}{2}$  col.

"As one who has been engaged as a manufacturer and an employer of labor for over thirty years, both in this country and in America, the author's opinions are entitled to respect...his views certainly are stimulating and deserving of careful study."

The knack of selling; System's new method of training men to sell. 6v. about 30 p. each. Shaw, \$3 net.

*Publishers' weekly*, Aug. 18, 1917, p.575.  $\frac{3}{4}$  col.

"Best thing on salesmanship the present reviewer has ever seen."

**Krogh, Andrew.**

Respiratory exchange of animals and man. 173 p. 1916. Longmans, \$1.80 net. (Monographs on biochemistry.)

*Journal of physical chemistry*, June 1917, p.523. 1 p.

"Relations between respiratory exchange and functional activity have been excluded from the scope of the present monograph, which deals therefore with one very limited problem only: the quantitative aspect of the catabolic activity of the living organism as living." *Wilder D. Bancroft*.



**Kuser, John Dryden.**

The way to study birds. Putnam, \$1.25.

*American forestry*, June 1917, p.374.  $\frac{3}{4}$  col.

"Author has sought to make bird identification a simple matter for the non-expert... His aim has been to supply this information in simple terms and to make it unnecessary for the student to wade ignorantly through a complicated mass of terms or descriptions."

**Kuss, Robert H.**

Steam boilers. 138 p. Am. Technical Soc., \$1.

*American machinist*, Aug. 16, 1917, p.306.  $\frac{3}{4}$  col.

"Considering that the volume costs but a dollar, there is everything in it that should be expected."

*Power*, Aug. 14, 1917, p.238.  $\frac{1}{2}$  col.

**Lahy, J.**

Le système Taylor et la physiologie du travail professionnel. 198 p. 1916. Masson, Paris.

*Bulletin de la Société d'Encouragement*, March-April 1917, p.443.  $\frac{4}{5}$  p.

**Lamb, A. B.**

Laboratory manual of general chemistry, with exercises in the preparation of inorganic substances. 166 p. 1916. Harvard Univ. Press, \$1.45.

*Nature*, June 7, 1917, p.281. 1 col.

"The object... is to widen the horizon of study of first-year university students who have had a previous training in chemistry at a secondary school, and at the same time to stimulate their further interest in important generalisations of science by means of experiments of a less familiar kind than those with which they have been previously acquainted." C. A. K.

**Lanchester, F. W.**

The flying machine from an engineering standpoint. 135 p. 1916. Constable, 4s. 6d. net.

*Nature*, May 24, 1917, p.241.  $2\frac{1}{2}$  col.

*Practical engineer*, June 21, 1917, p.299.  $\frac{1}{2}$  col.

"Main portion of this book was delivered by the author in the form of the James Forrest Lecture just prior to the outbreak of the war, and therefore gives a complete [*sic*] story of the rise and progress of the science of designing and building of flying machines as it is possible to possess... What the author set forth in the James Forrest Lecture will long remain a standard exposition of the subject."

**Lanchester, F. W.**

Le vol aérien. [v.2:] Aérodonétique; tr. from the English of the 2d. ed. by C. Benoit. 478 p. 1916. Gauthier-Villars, Paris.

*Bulletin de la Société d'Encouragement*, March-April 1917, p.442.  $\frac{1}{2}$  p.

**Larger, René.**

Théorie de la contre-évolution; ou, Dégénérescence par l'hérédité pathologique. 405 p. 1917. Alcan, Paris, 7 fr.

*Nature*, July 19, 1917, p.401.  $1\frac{1}{4}$  col.

"Dr. René Larger has developed the idea that gigantism and acromegaly may attack not an individual here and there... but may break out in a whole species or genus, so that all individuals become affected... finally with an unrestrained pitch of gigantism, in which condition the whole race or family perishes." A. Keith.

**Lavis, F.**

Railway estimates, design, quantities and costs. 608 p. 1917. McGraw, \$5.

*Canadian engineer*, June 28, 1917, p.545.  $\frac{1}{2}$  col.

"Author has... made available in convenient and concise form a vast store of practical information and cost data for engineers called upon to report on the value of, or

**Lavis, F.—continued.**

estimate the probable cost of proposed railways, either before or after surveys have been made... Should have a place in every consulting and practising engineer's library." *G. J. L. Boyd.*

*Engineering news-record*, July 19, 1917, p.128. 1 col.

"Contains some new things and presents others in a new and practical way... One would have been glad to find in the text three or four chapters instead of three or four pages on the subject of electrical operation and electrification of steam roads. Consistent use of this book cannot fail to be of service and support to any railroad engineer." *M. P. Paret.*

*Railway age gazette*, June 29, 1917, p.1,470. ½ col.

"The author's long contact with railway construction and operation is expressed in this book through his general comments on the material given, rather than through the presentation of data selected from his own work, for the book represents an arrangement of data collected from a variety of sources and evidences a careful study of all available material."

**Lawrence, Ralph R.**

Principles of alternating current machinery. 614 p. 1916. McGraw, \$4.50.

*Physical review*, Aug. 1917, p.216. ¼ p.

"The discussion is clear and is given with great thoroughness—almost exhaustive thoroughness so far as principles go... Will prove useful both to student and engineer." *F. B.*

*Technology review*, April 1917, p.262. 1 p.

**Leake, Percy Dewe.**

Depreciation and wasting assets, and their treatment in computing annual profit and loss. Ed.2. 233 p. 1917. Pitman, \$4.

*Electrical review (London)*, May 25, 1917, p.570. 1¾ col.

"Appears to be the consummation of an attempt to present the subject to the reader in a concrete form... There is... much that is distinctly good without being new, and much that is academic amid considerable observation and less penetration. In the writer's praiseworthy effort to uplift, he often fails to get underneath... However the book is interesting, and will repay perusal."

*Electrician*, June 1, 1917, p.353. ½ col.

"Careful study of depreciation and present methods of meeting this serious charge on industrial concerns... Three chapters have been added."

*Engineering*, June 1, 1917, p.513. 2¾ col.

"The author, in the foremost rank of reformers, perceiving common fallacies and dangers surrounding one class of problems—the adequate treatment of wasting assets—directs attention to these, attacking the inaccurate methods that have long survived in an unsatisfactory method of book-keeping."

*Engineering news-record*, July 19, 1917, p.129. ½ col.

"Deals mainly with industrial plants and the wastage of sale value... American industrial engineers and accountants might derive some useful ideas from the book, but valuation engineers in general will get little help from it."

**Lee, Roger L.**

Health and disease; their determining factors. 394 p. 1917. Little, \$1.75 net.

*Scientific American*, June 16, 1917, p.604. ½ col.

"A summary of medical knowledge that is much more comprehensive than is usual in books addressed to the layman, full of distinctive features and vital conclusions... May be especially recommended to employers, social workers, public health officers, and general practitioners as a sound summary of preventative medicine."

**Lehmer, Derrick Norman.**

Synthetic projective geometry. 120 p. 1917.

*Bulletin of the American Mathematical Society*, July 1917, p.456. 5 p.

"Clear and interesting little book, whose appearance we heartily welcome." *J. L. Coolidge.*

**Leighou, Robert B.**

Chemistry of materials of the machine and building industries. 449 p. McGraw, \$3 net.

*Engineering news-record*, June 21, 1917, p.603.  $\frac{1}{2}$  col.

"Neither a handbook nor a treatise... There is a curious admixture of the scientific and the popular methods of treatment. The references are many and interesting, though it is to be doubted whether the technical student will be other than bewildered by their number."

**Lelean, P. S.**

Sanitation in war. Ed.2. 336 p. 1917. Churchill, 6s. net.

*Journal of the Royal Sanitary Institute*, June 1917, sup. p.28.  $\frac{1}{4}$  p.

"Very useful handbook. The most noteworthy additions to this second edition are two chapters dealing with 'Some new departures in Field Sanitation' and 'The Rôle of Insects in War'... The new chapters maintain the high standard of the work." *H. R. K.*

**Lémeray, E. M.**

Le principe de relativité. 156 p. 1916. Gauthier-Villars, Paris, 3 fr. 75.

*Bulletin de la Société d'Encouragement*, March-April 1917, p.445.  $\frac{1}{3}$  p.

**Lewis, E. St. Elmo.**

Getting the most out of business. 515 p. Ronald, \$2.50.

*Machinery*, July 1917, p.1,038.  $\frac{1}{4}$  col.

"Might be called a philosophical treatise on the art of living and doing, and we recommend it to anyone in or out of business who has red blood in his veins as well worth reading."

**Lewis, William C. McC.**

System of physical chemistry. 2v. v.1, 523 p.; v.2, 552 p. 1916. Longmans, 9s. net each.

*Physical review*, Aug. 1917, p.214.  $1\frac{1}{4}$  p.

"In general, the author presents his subject matter with commendable clearness, but perhaps overemphasizes his lack of personal bias, and the statements of more or less conflicting views are not always accompanied by any actual sifting of the evidence. This, and the peculiarities of arrangement, seem to the reviewer the most evident faults in an otherwise excellent and useful book." *R. G. V. N.*

*Transactions of the Faraday Society*, June 1917, p.322. 1 p.

"Professor Lewis is to be congratulated on the admirable way in which he has solved the difficult problem of giving a fairly full and up-to-date and yet concise presentation of this important and rapidly growing branch of chemistry."

**Libby, Walter.**

Introduction to the history of science. 288 p. Houghton, \$1.50.

*General science quarterly*, May 1917, p.247.  $\frac{1}{4}$  p.

"Will fascinate high school students... The practical bearing of science from remote early times to the present is a feature of the book." *W. G. W.*

**Long, James.**

Food and fitness; or diet in relation to health. 208 p. 1917. Chapman & H., 5s. net.

*Nature*, June 21, 1917, p.323.  $\frac{1}{2}$  col.

"The purport... is an advocacy of vegetarian principles in diet... Contains a great deal of sound and useful information."

**Longitudinal initial motion and forced oscillations of a disturbed aeroplane.**

*Aviation and aeronautical engineering*, May 15, 1917, p.344.  $\frac{1}{2}$  col.

"The machine for which the effects are figured is Bryan's skeleton airplane consisting of a main forward flat plane and a real (?) tail flat plane." *E. B. Wilson.*



**Loomis, Ralph A.**

Progressive exercises in typography. Taylor-Holden, \$1 net.

*Inland printer*, Aug. 1917, p.685. ½ col.

"Designed to help those who do not know a thing about printing. In true pedagogical form, the book, which is in reality a course in the rudiments of printing, leads the beginner from the very simplest exercise, step by step, through properly succeeding work, which should give him experience in the essentials of printing."

**Lough, William H.**

Business finance. 616 p. Ronald, \$3.

*American machinist*, Aug. 16, 1917, p.306. 1 col.

*Electrical railway journal*, June 30, 1917, p.1,214. ½ col.

"Written from the point of view of the organizer or financial manager of an enterprise, this book deals with the every-day financial problems of the private business concern. Forms of business organization and of security issues, raising capital, handling capital and remedying mismanagement and irregularities—all these are clearly and thoroughly explained."

**Lovibond, J. W.**

Light and color theories and their relation to color standardisation.

89 p. 1915. Spon, 6s. net.

*Journal of the Society of Dyers and Colourists*, July 1917, p.171. 2½ col.

"Author has shown himself to be an authority on all questions of colour measurement and mixture... The purpose of the present volume is to make more widely known, methods of analysing, measuring and recording the colours of objects."

**Low, A. M.**

The two stroke engine. Temple Press, 1s. 6d.

*Electrical review (London)*, June 8, 1917, p.631. ½ col.

"As a scientific investigator who cares nothing for established practice, Dr. Low's views on the subject of two-stroke engines are naturally of considerable interest. We do not expect any work of his to be a mere catalogue of what others have done. Rather do we look for originality and bold forecasting." *G. S. S.*

**Luckiesh, M.**

Color and its applications. 357 p. 1915. Van Nostrand, \$3.

*Physical review*, Aug. 1917, p.215. ¼ p.

"While a number of misstatements occur in the earlier chapters, the treatment is, as a rule, clear. Numerous cuts and half-tones illustrate the text admirably. The later chapters, which deal with practical applications and which embody much of the author's own work, form by far the most important part of the book." *A. H. P.*

**Lunge, George.**

Manufacture of sulphuric acid and alkali. Ed.4. Supplement to v.1, Sulphuric and nitric acid. 347 p. 1917. Gurney & J., 15s. net.

*Chemical news*, July 6, 1917, p.12. ½ col.

"By the use of the supplement together with the original volume readers can obtain the latest and fullest information on the manufacture of sulphuric acid and alkali... In every way maintains the high standard which is characteristic of Prof. Lunge's work."

*Journal of the Society of Chemical Industry*, May 15, 1917, p.522. 8 l.

"Notes on the various papers and patent specifications on sulphuric and nitric acids which have appeared since the publication of the fourth edition in 1913... also added particulars obtained from official reports and private communications... Chapters are numbered in the same way as those in the original volume."

*Nature*, July 12, 1917, p.381. 1½ col.

"Strictly supplementary. It corrects any errors which may have been detected in the last edition, and adds such new matter as may have been published in the ordinary technical journals since 1912-13." *T.*

*Transactions of the Faraday Society*, June 1917, p.327. ¾ p.

"A valuable help in the ever increasingly difficult struggle to keep in touch with recent developments."

**Lunge, George.**

Technical chemists' handbook; tables and methods of analysis for manufacturers of inorganic chemical products. Ed.2, rev. 264 p. 1916. Gurney & J., 10s. 6d. net.

*Nature*, May 17, 1917, p.223.  $\frac{1}{4}$  col.

"Author's name is a guarantee that the data are trustworthy and the methods judiciously selected." C. S.

**Macaulay, F. S.**

Algebraic theory of modular systems. 112 p. 1916. Cambridge University Press, 4s. 6d. net.

*Nature*, June 14, 1917, p.302.  $\frac{3}{4}$  col.

"The originality and conscientiousness of this tract are so great that the reader must forgive the author for occasional obscurities."

**McCall, A. G.**

Field and laboratory studies of crops; an elementary manual for students of agriculture. 133 p. 1916. Chapman & H., 3s. 6d. net.

*Nature*, July 12, 1917, p.383.  $\frac{3}{4}$  col.

**McCullum, E. V.**

Text-book of organic chemistry for students of medicine and biology. 426 p. 1916. Macmillan, 10s. net.

*Nature*, June 7, 1917, p.281.  $\frac{1}{2}$  col.

"The subject matter is presented in a clear and attractive form, the sequence of the compounds described is chosen with care and with an advantageous departure from the usual order, and suitable prominence is given to the methods of preparation, properties, and synthetical relations of substances of biological and physiological importance."

**McDermaid, Neil J.**

Shipyard practice applied to warship construction. Ed.2. 332 p. Longmans, \$4.

*Canadian engineer*, July 26, 1917, p.80.  $\frac{1}{2}$  col.

"While the book was written to provide students and others with a knowledge of the actual operations performed in the shipyard during the construction of a warship, it is of great value to technical men and engineers, as it explains the inherent characteristics of ship construction." H. H. German.

**MacFarlane, Alexander.**

Lectures on ten British mathematicians of the nineteenth century. 148 p. 1916. Chapman & H., 5s. 6d. net. (Mathematical monographs, no.17.)

*Nature*, May 17, 1917, p.221. 1 $\frac{3}{8}$  p.

"The list is truly representative, consisting of Peacock, De Morgan, Hamilton, Boole, Cayley, Clifford, H. J. S. Smith, Sylvester, Kirkman and Todhunter." G. B. M.

**Mackrow, Clement, & Lloyd, Woodland.**

Naval architects' and shipbuilders' pocket-book of formulas, rules and tables. Ed.11. 742 p. 1916. Henley, \$5.

*Journal of the American Society of Mechanical Engineers*, July 1917, p.682.  $\frac{1}{5}$  col.

"A new section on speed and horse-power has been inserted, together with a brief description of modern methods of powering and determining forms suitable from a propulsive standpoint. The sections on strength of materials, riveted joints, and stresses in ships have been considerably extended, and information on British standard sections, screws, keys, etc., has been added."

**Maclean, Magnus.**

Electrical laboratory course for junior students. 120 p. 1916. Blackie, 2s. net.

*Electrical review (London)*, July 6, 1917, p.18.  $\frac{1}{4}$  col.

"Intended to cover an elementary first year's course in electrical engineering... All

**Maclean, Magnus**—*continued.*

the instructions and hints bear the hall-mark of practical experience and common sense." *P. H. S. K.*

*Nature*, July 19, 1917, p.402.  $\frac{1}{3}$  col.

"A well-arranged series of experiments." *A. Russell.*

**McMahan, John R.**

Success in the suburbs; how to locate, buy and build; garden and grow fruit; keep fowls and animals. 373 p. 1917. Putnam, \$2 net.

*Scientific American*, Aug. 4, 1917, p.86.  $\frac{1}{4}$  col.

**McNeil, H. L.**

Clinical and laboratory technic. 84 p. 1916. Mosby, \$1.

*American journal of public health*, June 1917, p.573.  $\frac{1}{2}$  p.

"Unevenly balanced, giving undue emphasis to the less important methods at the expense of some of much greater importance. It contains a brief and unusually satisfactory description of most of the common tests that a general practitioner will be called upon to make." *H. W. Watters.*

**McNicol, Donald.**

La télégraphie en Amérique; tr. by E. Pigault and G. Viard. 278 p. 11 fr.

*L'Industrie électrique*, July 25, 1917, p.277.  $\frac{1}{2}$  col.

**Magnusson, C. E.**

Alternating currents. Hill Pub. Co., 17s. net.

*Electrical review (London)*, July 6, 1917, p.17. 1 col.

"Excellent text-book which should prove useful to many undergraduate students of electrical engineering. Perhaps its leading characteristic is its great clearness and its consistent application of vectorial methods as adapted to a very large variety of problems."

**Mahin, John Lee.**

Advertising; selling the consumer. 321 p. 1916. Doubleday, \$2 net.

*Scientific American*, Aug. 18, 1917, p.128.  $\frac{1}{3}$  col.

"Successful, comprehensive survey of advertising organization to be unqualifiedly commended to all students of publicity."

**Mahin, John Lee.**

Mahin's advertising data book, 1917. Author, New York, \$2.

*Scientific American*, Aug. 18, 1917, p.128. 8 l.

**Marsh, [Charles Fleming,] & Dunn, [William.]**

Manual of reinforced concrete. Ed.3. 475 p. Constable, 10s. 6d. net.

*Engineering review*, May 15, 1917, p.345.  $\frac{1}{4}$  col.

**Marshall, Arthur.**

Explosives. Ed.2. 2v. 795 p. 1917. Blakiston, \$16.

v.1. History and manufacture. 407 p.

v.2. Properties and tests.

*Analyst*, July 1917, p.259.  $1\frac{1}{4}$  p.

"Mr. Marshall has taken the opportunity to enlarge the work... He has collated a large fund of information in a way which renders his book most useful for reference." *R. C. Farmer.*

*Engineer*, July 6, 1917, p.15.  $\frac{1}{2}$  col.

"The best treatise on explosives that has appeared in the English language since 1895, when the late Oscar Guttman... published his 'Manufacture of Explosives.'"

*Iron and coal trades review*, July 13, 1917, p.38, (review of v.2).  $\frac{3}{4}$  col.

*Journal of industrial and engineering chemistry*, Aug. 1917, p.822, (review of v.1).  $1\frac{1}{2}$  col.

"Revised from the standpoint of the necessities developed by the Great War, and the means by which they have been satisfied." *Charles E. Munroe.*

*Journal of the Society of Chemical Industry*, July 16, 1917, p.738.  $\frac{1}{3}$  col.

"Much enlarged and new illustrations provided."

*Nature*, June 21, 1917, p.321, (review of v.1). 1 p.

"By far the best book written and the most comprehensive in the language."



**Marshall, Percival, & Marshall, A. W.**

Engineering as a career. 51 p. Marshall, 6d. net.

*Engineering review*, April 16, 1917, p.313. ¼ col.

"The sub-title of the booklet states that it is 'A book of practical advice for boys and their parents.' We could hardly imagine a better description."

**Martin, Geoffrey.**

Industrial and manufacturing chemistry. pt.2: Inorganic. 2v. 1917. Lockwood, 25s. net each.

*Chemical news*, June 1, 1917, p.263, (review of v.1). ¼ col.

"Companion volume to the author's 'Treatise on Industrial Organic Chemistry,' and is very similar to it in scope and plan...An enormously wide field is covered...Diagrams and illustrations are very numerous, and the references to literature are full and detailed...The value of the book would probably be greater to technical students and to practical business men...than to the specialist."

*Engineer*, June 15, 1917, p.545, (review of v.1). ¾ col.

"At least thirty-six out of the fifty-one sections have already been published word for word...in volumes three, four, five, six and seven of the 'Manuals of Chemical Technology,' published during 1915 and 1916 by Messrs. Crosby Lockwood...Of the new sections one or two are distinctly on the 'scrappy' side. Indeed, eleven out of the fifteen occupy a total net space of but thirty-seven pages."

*Engineer*, Aug. 3, 1917, p.101, (review of v.2). ½ col.

**Martin, William.**

Manuel [*sic.*] of diagraphograms. 46 p. 1917. Author, Providence, R. I.

*Scientific American*, June 16, 1917, p.604. ½ col.

"A diagraphogram is a shorthand character used as an abbreviation for a word or group of words...The collection here offered contains some eight hundred of these diagraphograms."

**Massachusetts Institute of Technology.**

Studies on the digestion of a sewage-filter effluent by a small and otherwise unpolluted stream, by Robert S. Weston & C. E. Turner. 96 p. The Institute, \$1. (Contributions from the Sanitary research laboratory and sewage experiment station, v.10.)

*American journal of public health*, Aug. 1917, p.712. ¾ p.

"Many more such investigations should be made in various localities, and the one discussed here may well serve as guide." *Arthur Lederer.*

*Engineering news-record*, June 21, 1917, p.604. ¼ col.

"Biological and chemical study of the effect of discharging treated filtered Brockton (Mass.) sewage...The studies covered the two years ended Feb. 1, 1916."

**Mathews, Gregory M.**

Birds of Australia. v.6, pt.2-3. 1917. [Witherby.]

*Auk*, July 1917, p.352. 2¼ p.

"The parrots which furnish the subject matter of these last two parts present a gorgeous array of species...The accounts of the various species are based upon the observations of Mr. Mathews' correspondents in Australia as well as upon published accounts and appear to bring the subject fully up to date." *W. S.*

*Ibis*, July 1917, p.445, (review of v.6, pt.3). 1½ p.

**Mathews, R. Borlase.**

Aviation pocket book, 1917. Ed.5, rev. & enl. Lockwood, 4s.6d. net.

*Aeronautics*, July 18, 1917, p.61. ½ col.

"Practically all the features [of the 1916 edition] to which objection was raised have been removed, and the whole production improved out of all recognition."

*Practical engineer*, Aug. 2, 1917, p.53. ½ col.

"Contains much information of value to both the engineer and the aviator."

**Mayo Clinic, Rochester, Minn.**

Collected papers. 1,014 p. 1917. Saunders, \$6.50 net.

*Pennsylvania medical journal*, Aug. 1917, p.793.  $\frac{1}{2}$  col.

"For the surgeon who wishes to be right up to the minute in his work this volume is a necessity." G. H. B. T.

**Meade, Alwyne.**

Modern gasworks practice. 529 p. Van Nostrand, \$7.50 net.

*American gas engineering journal*, June 16, 1917, p.591.  $\frac{1}{2}$  col.

"A really excellent and complete work, though written entirely for the English gas maker...The author has endeavored to present his matter in as clear and as non-technical manner as possible and has succeeded admirably."

*Engineering*, July 27, 1917, p.98.  $2\frac{3}{4}$  col.

"Much ground is covered in various directions: many interests are served and an acknowledged want remedied...Likely to hold its own as a valuable work of reference concerning the technique of gas manufacture."

**Meares, J. W. & Neale, R. E.**

Electrical engineering practice. Ed.3, rev. & enl. 521 p. Spon, 25s. net.

*Illuminating engineer*, May 1917, p.144.  $\frac{1}{2}$  col.

"An attempt to fill the gap between pocket-books of bare data and highly technical treatises. The language is concise, and the authors have illustrated each point by many practical illustrations and useful data."

*Ironmonger*, July 7, 1917, p.45.  $\frac{1}{2}$  col.

"Extraordinarily comprehensive and yet in no wise a mere book of reference. A good deal of space is devoted to elementary considerations, to the explanation of terms, and to descriptions and the uses of measuring instruments."

*Journal of the Royal Society of Arts*, July 13, 1917, p.600.  $\frac{3}{4}$  col.

"Appeals to civil, mechanical and electrical engineers."

**Mercantile yearbook and directory of exporters.** Lindley Jones, 15s.

*Engineer*, June 22, 1917, p.570.  $\frac{1}{2}$  col.

"Its thirty-first annual issue, contains not only more pages than ever, but also a new feature...For the first time Part II., which consists of lists of importers in the British Colonies, and in foreign countries, shows also the class of goods purchased by these importers."

**Michel, Ch.**

Cours d'algèbre et d'analyse. 858 p. 1916. Alcan, Paris, 18 fr.

*Revue générale des sciences pures et appliquées*, May 15, 1917, p.281. 1 col.

**Middleton, E. C.**

The way of the air. Heinemann, 2s. 6d. net.

*Aeronautics*, July 18, 1917, p.61.  $\frac{1}{2}$  col.

"Apparently consists of a collection of newspaper articles that have appeared in the cheaper organs of the daily Press, though no doubt modified for the present occasion... Comment is superfluous."

**Miessner, B. F.**

Radio-dynamics; the wireless control of torpedoes and other mechanisms. 206 p. 1917. Lockwood, 9s. net.

*Nature*, Aug. 2, 1917, p.442.  $1\frac{1}{2}$  col.

"The practical problem of certain control cannot be said to have been solved. The present book deals, therefore, with an experimental stage of the subject, which may, however, have considerable possibilities of actual utility in warfare." J. A. F.

**Miller, S. W.**

Oxy-acetylene welding. 287 p. 1916. Industrial Press, \$2.50.

*Gas age*, Sept. 1, 1917, p.196.  $\frac{3}{4}$  col.

"Comprehensive treatise on the practice of welding cast iron, malleable iron, steel, copper, brass, bronze and aluminum by the oxy-acetylene method. Concise information on the equipment required for both welding and cutting by this process is also given in a systematic manner."

**Miyake, T.**

Konchûgaku Hanron Jôkwan. [General treatise on entomology.]  
1917. Shôkâbo, Nihonbashi, Tokyo, 3.50 yen.

*Science*, Aug. 3, 1917, p.113. ¾ col.

"Deals with the morphology, physiology and embryology of insects, a field to which, the author states, Japanese entomologists have hitherto made very few contributions. The book is therefore largely a compilation, though here and there the researches of Japanese entomologists are quoted. . . A pioneer of its kind, and the most detailed book that has ever appeared in Japan." *L. O. Howard*.

**Morgan, J. O.**

Field crops for the cotton-belt. 456 p. 1917. Macmillan, 7s. 6d. net.

*Nature*, June 28, 1917, p.342. 1½ col.

"A study of the book leaves the conviction of its practical utility so deeply impressed that one is constrained to recommend improvement of existing supplies (especially Indian) on the lines set forth by the author as a more rational procedure than the discovery of new areas of production. . . May be commended to all persons interested in cotton or the associated crops of cotton."

**Morgan, Thomas Hunt.**

Critique of the theory of evolution. Princeton Univ. Press, \$1.50 net.

*Pennsylvania medical journal*, July 1917, p.741. ½ col.

**Morris, T. N.**

Microscopic analysis of cattle-foods. 74 p. 1917. Cambridge University Press, 2s. net.

*Nature*, July 26, 1917, p.423. ¾ col.

"Information is clear, concise and accurate, and the accompanying diagrams are in many cases excellent. . . Should prove very useful to the agricultural student, and within its limits also to the agricultural analyst."

**Moses, Alfred J. & Parsons, C. L.**

Elements of mineralogy, crystallography and blowpipe analysis. Ed.5. 643 p. 1916. Van Nostrand, \$3 net.

*Scientific American*, June 16, 1917, p.604. ¼ col.

"Authors. . . are eminently qualified by their combined experiences to present significant facts in an orderly and readily understandable manner."

**Moss, Herbert.**

Heat drop tables; absolute pressures. E. Arnold, 5s. net.

*Iron and coal trades review*, Aug. 3, 1917, p.121. ¼ col.

"Based on equations formulated by Professor H. L. Callendar."

*Practical engineer*, Aug. 2, 1917, p.53. ¼ col.

"Preface contains a great deal of information as regards the methods of arriving at correcting factors, which not only explain [*sic*] the tables but provides for their extension and variation."

Motor transport year book and directory for 1917. Electrical Press, 10s. 6d. net.

*Iron and coal trades review*, Aug. 3, 1917, p.121. ¼ col.

"Second year of issue of this useful annual."

**Moyer, James Ambrose.**

Steam turbines. Ed.3. 460 p. Wiley, \$3.50.

*Mining and scientific press*, June 30, 1917, p.936; July 21, 1917, p.110 (same review). ¼ col.

"This excellent work is a compendium for power users, being a practical and theoretical treatise for engineers and students. . . Many changes have been made in some departments of the book and it is in every sense up-to-date."



**Muguet, A.**

La radioactivité et les principaux corps radioactifs; applications médicales et industrielles. 196 p. 1917. Doin, Paris, 5 fr.

*Revue générale des sciences pures et appliquées*, July 15, 1917, p.409. 1½ col.

**Muldoon, Hugh C.**

Lessons in pharmaceutical Latin and prescription writing and interpretation. 173 p. 1916. Chapman & H., 6s. net.

*Nature*, July 19, 1917, p.403. ¼ col.

"Assumes no knowledge of Latin on the part of the student and endeavours to teach him what is essential in the limited time at his disposal. . . Deserves to meet with success."

**Mullen, Charles A.**

Paving economy; road and street. 98 p. unb. Industrial and Educational Press, Montreal, \$1.

*Engineering news-record*, June 21, 1917, p.603. ¼ col.

**Mulliken, S. P.**

Method for the identification of pure organic compounds. v.2. 1916. Wiley.

*Technology review*, April 1917, p.263. ¾ p.

"Has special practical importance to the arts, since it furnishes detailed directions for the identification of such essential substances as the alkaloids, many important drugs as well as vegetable and animal constituents, the high explosives and intermediates of the dyestuff industry." *A. G. W.*

**Munro, Henry S.**

Handbook of suggestive therapeutics, applied hypnotism, psychic science. Ed.4, rev. and enl. 1917. Mosby, \$5 net.

*American journal of public health*, June 1917, p.574. ¼ p.

"While in no way to be recommended as a book of reference or as a systematic exposition of the subject, the book is entertaining, shows much good sense and should be stimulating to the general practitioner." *C. Macfie Campbell.*

**Murdoch, J.**

Microscopic determination of the opaque minerals. 170 p. Chapman & H., 9s. 6d.

*Mining magazine*, June 1917, p.319. 1¼ col.

"A thoroughly useful and practical manual for the microscopic identification of ore minerals, and a valuable contribution to the literature of determinative mineralogy." *W. H. Goodchild.*

**Murray, Athole J.**

Strength of ships. 1916. Longmans, 15s. net.

*Engineer*, June 1, 1917, p.503. ½ col.

"Should prove useful to the student, and to those who have to deal with strength calculations for new designs."

**Musser, John H. jr. & Kelly, T. C. ed.**

Handbook of practical treatment. v.4, with complete index to v.I-4. 1,000 p. 1917. Saunders, \$7 net.

*Pennsylvania medical journal*, Aug. 1917, p.793. ¾ col.

"Completes a series that forms a full and comprehensive presentation of the treatment of diseases from all angles." *E.*

**Naylor, C. H.**

Correction tables for thermodynamic efficiency. E. Arnold, 5s. net.

*Iron and coal trades review*, Aug. 3, 1917, p.121. ¼ col.

"Will prove a great help and time saver to all engaged in turbine testing. A note, however, should have been added to the effect that the corrections are for turbines working against full load under conditions for which they were specially designed."

*Practical engineer*, Aug. 2, 1917, p.53. ¼ col.

"Most valuable addition to technological practical works of reference."

**Nernst, Walter.**

Theoretical chemistry. 853 p. 1916. Macmillan, \$5.

*Science*, June 15, 1917, p.615. 2½ col.

"Everything in the book is at least five years old...Nernst is not willing to take the trouble to revise any parts...except those dealing with his own researches...While one may object seriously to the order in which the subject is presented and to the spirit in which the book is written, there is no gainsaying the fact that Nernst is an extremely able man and that his book contains a great deal of valuable information." *Wilder D. Bancroft*.

**New South Wales—Geological survey.**

Molybdenum industry in New South Wales. The Survey, 10s.

*Mining magazine*, July 1917, p.45. 7 l.

"Particulars are given of plants for concentrating the ore by flotation."

**Newland, C. Bingham.**

What is instinct? some thoughts on telepathy and subconsciousness in animals. 217 p. 1916. Murray, 6s. net.

*Nature*, May 24, 1917, p.243. ½ col.

"Mr. Newland, as a sportsman and field naturalist, has many interesting facts to submit and personal observations to relate...but he has ventured on a line of interpretation where verification is impossible...Mr. Newland is altogether too metaphysical." *J. A. T.*

**Northrup, Edwin F.**

Laws of physical science; a reference book. 210 p. 1917. Lippincott, \$2.

*Mining and scientific press*, Aug. 18, 1917, p.257. ¼ col.

"Extremely handy book of reference, prepared by a man competent for the task."

*Railway and locomotive engineering*, July 1917, p.243. 1½ col.

"Contains a full list of the general propositions or laws of the various divisions of physical science...The student finds guidance by having before him an epitome of what is now known regarding that important branch of the science which concerns matter and material things...A bibliography and index are included...Mechanical engineers on railways and others having formulas to deal with will find this book a great help in their work."

**Norton, Jeannette Young.**

Mrs Norton's cook book; selecting, cooking and serving for the home table. 634 p. Putnam, \$2.50.

*American food journal*, Aug. 1917, p.440. ¾ col.

"Thoroughly up-to-date book of recipes. It aims to tell the modern housewife, of a little more than average prosperity, how to prepare the dishes that comfortably situated twentieth-century people eat."

**Nottage, W. H.**

Calculation and measurement of inductance and capacity. 137 p. Wireless Press, 2s. 6d.

*Model engineer and electrician*, May 31, 1917, p.348. ¼ col.

"Essentially a book for advanced readers, and contains a large amount of formulæ and examples of calculations."

*Nature*, July 19, 1917, p.401. 1 col.

"Author seems to have written the book rather hurriedly. The wireless electrician and the physicist, however, will find it useful." *A. Russell*.

**Nystrom, Paul H.**

Economics of retailing. 400 p. Ronald, \$2.

*American food journal*, Aug. 1917, p.439. ¼ col.

"All who are anxious to have placed before them in interesting, readable form an intelligent survey of modern retailing will find Mr. Nystrom's book highly satisfactory."

**Official auto wiring guide.** 500 p. International Motor Institute, \$7.50.

*Electrical review (Chicago)*, July 28, 1917, p.158. ½ col.

"In blue-print form...showing complete and guaranteed accurate diagrams of all makes and models of gasoline cars, and of all makes of electric lighting and starting equipment. In addition there is a section covering the operation, care and repair of batteries based on the latest approved practice...Should fill a long felt want, for with it a mechanic can tell at a glance the wiring circuits, connections, etc., of any make of car."

**Ontario—Highway department.**

**Report on street improvement in Ontario.** 200 p. The Department, Toronto.

*Engineering news-record*, Aug. 16, 1917, p.325. ½ col.

"Presents 'the progress of street improvement' in 21 cities and 11 towns of the Province of Ontario...A most creditable production."

**Otis, Edward O.**

**Pulmonary tuberculosis; a handbook for students.** 1917. Leonard, \$1.75.

*Saint Paul medical journal*, July 1917, p.228. ½ col.

"Strongly recommended to every physician who is called upon to treat lung conditions. The chapters on Diagnosis and Treatment are particularly full and show the sane judgment of a man who has had a wide experience with tuberculosis." *C. B. Drake.*

**Owen, Hubley R.**

**Treatment of emergencies.** 350 p. 1917. Saunders, \$2 net.

*Pennsylvania medical journal*, Aug. 1917, p.793. ½ col.

"Contains the amount of medicine and surgery that a policeman, a fireman or a nurse should know. Any layman that wishes to become proficient in first-aid work will find it most valuable." *G. H. B. T.*

**Pagé, Victor W.**

**How to run an automobile.** 178 p. Henley, \$1.

*American machinist*, Aug. 9, 1917, p.262. ½ col.

"Tells, in a very practical manner, the essentials of operating various types of American motor cars."

*Compressed air magazine*, June 1917, p.8413. ½ col.

"By an engineering writer of large experience who has made the automobile his special study. It deals with all the well known automobiles in general and in detail, giving explicit instructions for starting and running."

**Pagé, Victor W.**

**Storage batteries simplified.** 208 p. Henley, \$1.50.

*Building age*, Aug. 1917, p.454. ½ col.

"Aims to present in easily understandable, non-technical language, the basic principles of storage battery action as well as their practical industrial applications, and presents valuable information concerning this subject."

**Palmer, T. S. comp.**

**Biographical index to 'The Auk,' 1876-1914.**

*Ibis*, July 1917, p.447. ½ p.

"Useful index to the names of all persons of whom biographical notices have been published in the 'Auk' and its predecessor, the 'Bulletin of the Nuttall Ornithological Club.' It also includes the names of all deceased members of the American Ornithologists' Union up to the end of 1914."

**Parker, Horatio Newton.**

**City milk supply.** 493 p. McGraw, \$5.

*American food journal*, Aug. 1917, p.440. ½ col.

"Thoroughly admirable text-book of the city milk business—lucid, well-arranged, and well printed."



**Parkhurst, Frederic A.**

Applied methods of scientific management. 337 p. Wiley, \$2.

*Canadian engineer*, July 26, 1917, p.79. 1½ col.

"Scientific management has many phases, one of the most important of which Mr. Parkhurst has covered, namely, the industrial machine shop. His book is a highly practical and complete description of the application of scientific management to the works of the Ferracute Machine Co." *R. E. W. Hagarty*.

**Parsons, Carl C.**

Office organization and management. 313 p. La Salle Extension University.

*American industries*, July 1917, p.40. ¾ col.

"Written, primarily, for the advanced student, and it does what text books rarely do, it brings the business atmosphere into the class-room."

*Iron age*, Aug. 2, 1917, p.255. ½ col.

"Discusses a large number of subjects relating to office work. . . Contains much good advice, but naturally there are many points on which many who have had experience in office management will disagree with the author."

**Parsons, H. de B.**

Steam boilers. Ed.5. 377 p. Longmans, \$4 net.

*Power*, July 31, 1917, p.168. 1½ col.

"Considering the little that has been added to the book we can see no reason for this latest edition."

**Payne, David W.**

Founder's manual. 676 p. 1917. Van Nostrand, \$4 net.

*Industrial management*, July 1917, p.621. ½ col.

"This book, by the editor of *Steam*, is a comprehensive aggregation of facts, tables and data bearing upon foundry operation drawn from a great variety of sources. . . The physics and chemistry of iron founding, as well as the question of foundry accounts, are all treated at considerable length. . . Should prove especially useful to technical students, as well as to foundrymen who need a ready reference book of special information, comprising topics that do not often come up in the regular run of foundry work."

*Iron trade review*, July 12, 1917, p.88. 1½ col.

"A vast amount of material for the solution of problems which are continually presented in the foundry. . . A pig iron directory. . . is one of the features. . . In this directory the grades of foundry iron, coke and anthracite and charcoal irons are classified separately."

*Scientific American*, June 16, 1917, p.604. ¾ col.

"Both student and foreman may be very sure of finding, through the exhaustive index, any knowledge they may need to acquire."

**Pearson, T. Gilbert.**

The bird study book. 258 p. 1917. Doubleday, \$1.25 net.

*American forestry*, Aug. 1917, p.504. ½ col.

"To those who are interested in bird life. . . this little book, charmingly illustrated, will prove a mine of pleasure and information. . . Not intended so much for the advanced student of ornithology as for the beginner."

*Auk*, July 1917, p.348. 1 p.

"Begins with general instructions as to the best ways to become familiar with wild birds, following with a discussion of the structure of birds' nests, their variability and where to look for them, and then an account of the domestic life of birds. . . Admittedly intended primarily for the beginner, and the author seems to have been most happy in the character of the information which he has collected and in the manner of its presentation." *W. S.*

*Wilson bulletin*, June 1917, p.109. ½ p.

"Well worth the attention of every body, whether he has any particular interest in the birds or not, and should prove of exceptional value to the beginner." *L. J.*

**Pease, Clara A.**

First year course in general science. 315 p. Merrill.

*General science quarterly*, May 1917, p.245. 1 p.

"Style. . . is clear, concise and readable and the minimum of trouble is experienced in the pupil getting the thought." *G. H. Curtis*.

**Peddie, R. A.**

Outline of the history of printing. 58 p. Grafton, \$.60 net.

*Inland printer*, Aug. 1917, p.685.  $\frac{3}{8}$  col.

"Briefly, the invention of printing, its history during the early centuries of its practice, paper, presses, photographic illustration and engraving, are reviewed...A complete, though brief, history of the art which has fostered and preserved all other arts."

**Pennsylvania—Forestry department.**

Report, 1914-15. 247 p. 1916. The Department, Harrisburg.

*Journal of forestry*, May 1917, p.655.  $\frac{3}{8}$  p.

"Gives evidence that forestry has 'arrived' in Pennsylvania. We recommend the perusal of this report to every State forester or forest commission, in order to see where they ought to be." B. E. F.

**Pennsylvania University.**

Illuminating engineering practice. 578 p. McGraw, \$5.

*Electrical review (Chicago)*, July 28, 1917, p.158.  $1\frac{1}{4}$  col.

"Series of lectures by eminent illuminating specialists...at the University of Pennsylvania under the joint auspices of the Illuminating Engineering Society and the University...A most valuable addition to the literature on illuminating engineering."

**Perkin, Frederick Mollwo, & Jagers, E. M.**

Text-book of elementary chemistry. 384 p. 1916. Constable, 3s. net.

*Nature*, May 17, 1917, p.223.  $\frac{1}{2}$  col.

"Experiment...is the keynote of the book. The authors teach mainly by experiment, and endeavour...to lead from fact to fact in an interesting and logical sequence." C. S.

*Transactions of the Faraday Society*, June 1917, p.326.  $\frac{3}{8}$  p.

"In this volume...are treated the elements of inorganic chemistry, and in addition a little general physics, organic chemistry and technical chemistry."

**Perrin, Jean.**

Atoms; tr. from the fourth revised edition. Constable, 6s. net.

*Electrical review (London)*, June 1, 1917, p.661. 1 col.

"Sets out in brilliant style the case of the atom from our first rudimentary conceptions of it as the ultimate irreducible particle right down to our latest pictures of it as a whirling system of electrons...A valuable epitome of the greater part of our knowledge of the atom as such knowledge stands today."

**Petersson, C. E. W. & Steveni, W. B.**

How to do business with Russia. 202 p. Pitman, \$2.25.

*Engineering review*, July 16, 1917, p.24.  $\frac{3}{4}$  col.

"Will prove of great service to all who wish to open up business relations with Russia." W. S. M.

*Iron and coal trades review*, June 29, 1917, p.742. 1 col.

"Summary of the experience and business methods of Mr. Petersson, a merchant of Petrograd and Riga, who for many years has successfully carried on a large trade in machinery and kindred goods with various Russian towns."

**Petronievs, B.**

L'oeuvre des Slaves dans les progrès de la science. 32 p. 1917. Am. Bk. Supply, 1s.

*Revue générale des sciences pures et appliquées*, June 30, 1917, p.378.  $\frac{1}{3}$  col.

**Phillips, R. E. & Flack, A. M.**

A B C guide to patents for inventions. Phillipss (?), 6d. net.

*Engineering review*, April 16, 1917, p.313.  $\frac{1}{4}$  col.

**Pocock, Roger.**

Horses. 252 p. 1917. Murray, 5s. net.

*Nature*, July 5, 1917, p.364.  $\frac{5}{8}$  col.

"Interesting little volume, written by one who has spent much of his life among horses as a ranchman."

**Poorman, A. P.**

Applied mechanics. 244 p. McGraw, \$2.

*Canadian engineer*, July 26, 1917, p.80.  $\frac{3}{8}$  col.

"One is struck very forcibly by the large collection of examples illustrating each part of the subject... Readers must understand the calculus to get the real value of the book." *R. W. Angus.*

*Engineering news-record*, July 19, 1917, p.131.  $\frac{3}{4}$  col.

"Undoubtedly will be hailed as a most effective tool by teachers of mechanics who are attempting to create clear, permanent and definite conceptions in the minds of their engineering students." *J. P. J. Williams.*

**Porter, J. Edward.**

Activated-sludge process of sewage treatment; a bibliography of the subject, with brief abstracts, patents, etc. 40 p. General Filtration Co., Rochester, N. Y., \$.25.

*Engineering news-record*, June 21, 1917, p.604.  $\frac{1}{2}$  col.

"Entries are chronological from the two for 1913 up to May 3, 1917... An index of authors and chronological lists of references to each of the journals included in the bibliography are given... Another valuable feature... is a series of 'Definitions' applicable to the activated-sludge process."

*Municipal journal*, June 14, 1917, p.805.  $\frac{1}{2}$  col.

"A bibliography on the subject, in which are listed 221 articles that have appeared in English and American technical periodicals and society proceedings... A brief abstract of each article is given."

**Practical dynamo and motor management. Rentell, 6d.**

*Model engineer and electrician*, May 31, 1917, p.348.  $\frac{1}{2}$  col.

"Should be welcome to many attendants and users of electrical machinery."

**Prescott, Samuel Cate, & Winslow, E. A.**

Elements of water bacteriology, with special reference to water analysis. Ed.3, rewritten. 318 p. Wiley, \$1.75 net.

*American food journal*, Aug. 1917, p.439.  $\frac{1}{2}$  col.

"The authors have come to the conclusion that the five standard tests for 'typical B. coli' are no longer satisfactory, and take the view that the whole group of aerobic lactose-fermenting bacilli are significant. This is reflected in the three chapters devoted to a general discussion of the colon group."

**Pull, Ernest.**

Modern milling. 207 p. Whittaker, 7s. 6d. net.

*Engineering review*, May 15, 1917, p.345.  $1\frac{1}{2}$  col.

"If in his next edition Mr. Pull will depend less on the kind attentions of the machine makers and more on his own knowledge of the subject, he will produce a manual of real value to practical operators." *W. S. M.*

*Iron and coal trades review*, June 29, 1917, p.742.  $\frac{1}{4}$  col.

"This useful and practical manual on milling machines, their accessories, and work done with them has been compiled for the use of engineers, mechanics, and students by the author, who is lecturer and instructor at the London County School of Engineering and Navigation at Poplar."

*Ironmonger*, July 7, 1917, p.45.  $\frac{1}{2}$  col.

"Author has avoided cleverly the suspicion that he has merely been engaged in exploiting this or that type of machine. The illustrations serve to explain mechanism, movements, and operations, while the descriptive letterpress is soundly presented and the numerous tables incorporated in the text are well arranged."

*Model engineer and electrician*, May 17, 1917, p.316.  $\frac{1}{2}$  col.

"Is well printed, and is sure to prove of great utility; the only criticism we have to make is that the title is somewhat ambiguous; the matter which the author has compiled is excellent and very appropriate to the present great development in engineering work-shop practice."



**Railway signal and permanent way engineer's pocket book.** 260 p. Locomotive Publishing Co., 2s. 6d.

*Railway signal engineer*, July 1917, p.194. ¼ col.

"While...not by any means a comprehensive treatment of English practice, the information contained may be of interest to some American signalmen."

**Ramsower, Harry C.**

Equipment for the farm and the farmstead. 535 p. 1917. Ginn, \$2.25 net.

*Scientific American*, Aug. 4, 1917, p.86. ¼ col.

"Cast into pedagogic form for the student, yet keeps practical needs strictly in view."

**Read, Mary L.**

Mothercraft manual. 440 p. 1916. Little, \$1.25.

*Science*, July 6, 1917, p.19. ¼ col.

"Presents, in language which is a delight, modern as well as old world knowledge helpful in the creation of the best environment for the family and describes the care, nutrition and development of the child." *Graham Lusk*.

*Social hygiene*, July 1917, p.392. 1½ p.

"An extensive bibliography completes the book...Throughout the work there is a spirit of quiet poise, cheerfulness, and optimism." *E. W. Y.*

**Recknagel, A. B.**

Theory and practice of working plans (forest organization). Ed.2. 265 p. 1917. Wiley, \$2 net.

*Canadian engineer*, June 28, 1917, p.545. 1 col.

"The art of the organizer and the object of the working plan is to gradually bring the usually abnormal forest into approximately normal conditions in such a manner that the future is provided for without too much sacrifice of present interests." *B. E. Fernow*.

*Journal of forestry*, May 1917, p.633. 2 p.

"Should help foresters...to have more enthusiasm for the theory and practice of working plans." *T. S. Woolsey, jr.*

**Reinhardt, Charles W.**

Lettering for draftsmen, engineers and students. Ed.14, rev. & enl. 55 p. 1917. Van Nostrand, \$1 net.

*Scientific American*, Aug. 4, 1917, p.86. ¼ col.

"For ornate alphabets the draftsman must look elsewhere; but for a system of lettering that is rapid, yet artistic, and that comes out sharply under photographic reduction, he can find no better guide than is here offered."

*Sibley journal of engineering*, Aug. 1917, p.240. ¾ col.

**Remington, Joseph P. and others.**

Practice of pharmacy. 2v. Lippincott, \$4.50 each.

*Journal of the American Pharmaceutical Association*, Aug. 1917, p.766, (review of v.1, pt.1-2). 2¼ p.

"Should undoubtedly be in the hands of every active pharmacist and student, as well as of every progressive physician." *John Uri Lloyd*.

**Rey, Jean.**

Range of electric search light projectors; tr. by J. H. Johnson. 152 p. 1917. Constable, 12s. 6d. net.

*Engineer*, July 20, 1917, p.59. 1¾ col.

"A very valuable and practical book."

*Engineering*, July 6, 1917, p.19. 3½ col.

"Author's object is simply to discuss the range of projection of the light emitted, or to determine what amount of illumination will be distributed over a distant object under given conditions of transmission and absorption...M. Rey's diagrams facilitate, or dispense with, calculation in finding a solution for many interesting problems connected with aerial or military work."

*Nature*, July 19, 1917, p.401. 1 col.

"Will prove of great value to engineer officers." *A. Russell*.

**Richardson, O. W.**

Emission of electricity from hot bodies. 304 p. 1916. Longmans, 9s. net.

*Transactions of the Faraday Society*, June 1917, p.324. 1½ p.

"The subject with which the book deals is the fact that not only do all bodies become electrically conducting at sufficiently high temperatures, but solids and liquids have the power of conferring conductivity on the space surrounding them, even when this is a vacuum. These phenomena are what he calls thermionic, and he himself more than any one else is responsible for their elucidation."

**Rickard, Thomas Arthur, ed.**

The flotation process. 364 p. 1916. Mining and Scientific Press, 8s. 6d.

*Journal of the Society of Chemical Industry*, May 15, 1917, p.522. ½ col.

"Useful collection of papers published in the *Mining and Scientific Press* on the practice and theory of the flotation process."

**Ries, Heinrich.**

Economic geology. Ed.4. 856 p. Chapman & H., 18s. 6d.

*Mining magazine*, July 1917, p.44. 1 col.

"The most complete and serviceable work of moderate dimensions in the English language."

**Robinson, Ernest F.**

Military preparedness and the engineer. 1916. Clark Bk. Co. Inc.

*Journal of the Cleveland Engineering Society*, May 1917, p.408. 1½ col.

"Author has covered a very large subject in a very small book, consequently has touched the high spots only and these with but little detail...The subjects treated are well arranged as to sequence, and the cuts and illustrations are numerous."

**Rodet, J.**

Actions physiologiques et dangers des courants électriques. 88 p. 3 fr. 25.

*L'Industrie électrique*, July 25, 1917, p.277. ½ col.

**Roe, Joseph Wickham.**

English and American tool builders. 315 p. Yale University Press, \$3.

*Iron age*, Aug. 23, 1917, p.456. ¾ col.

"The reader, when he has finished it, will have a clear idea of the steps taken to bring machine tools to their present state of perfection...The author is to be commended for the great work he has done in putting on record the facts concerning this industry."

**Rogers, Allen.**

Elements of industrial chemistry. 513 p. 1916. Van Nostrand, \$3 net.

*Journal of industrial and engineering chemistry*, Aug. 1917, p.821. 2½ col.

"Express purpose of this book is to meet the needs of teachers who do not have sufficient time in their courses to use more extended treatises...A handy sized compilation from the author's well-known Manual...As a teachable book this volume is divided into convenient sized chapters. It is a distinct advance on its predecessors in that it is more American than they, while giving due credit to foreign processes. It is remarkably free from errors." *James R. Withrow.*

**Rowell, Percy E.**

Elementary general science, book 1. 197 p. Author.

*General science quarterly*, May 1917, p.246. ¼ p.

"Many teachers will find this little book of much value in their classes." *R. M.*

**Rowell, Percy E.**

Introduction to general science, with experiments. 295 p. Macmillan.

*General science quarterly*, May 1917, p.246. ½ p.

"The plan of the book is splendid...Of great service in my first year classes." *Thomas D. Ginn.*

**Royal Medical Society.**

Origin, symptoms, pathology, treatment and prophylaxis of toxic jaundice observed in munition workers. 106 p. Longmans, 7s. 6d. net.

*Chemical news*, Aug. 3, 1917, p.59.  $\frac{3}{8}$  col.

"Full report of a detailed discussion, held in January, 1917, by the Sections of Medicine, Pathology, and Epidemiology of the Royal Society of Medicine. Many of the most eminent authorities who have had special opportunities of studying the subject... were present and took part in the discussion, and very full accounts were given of their experience and opinions."

**Royal Ontario Nickel Commission.**

Report, with appendix. 1917. Legislative Assembly of Ontario. Toronto.

*Mining and scientific press*, Aug. 18, 1917, p.258.  $\frac{1}{2}$  col.

"The most exhaustive study of nickel from every aspect that has hitherto been printed in English... As a reference book it will prove of the greatest value to the metallurgist."

**Ruddiman, Edsel A.**

Incompatibilities in prescriptions. Ed.4 thoroughly rev. 317 p. 1917. Wiley, \$2 net.

*American journal of pharmacy*, Aug. 1917, p.374.  $\frac{3}{8}$  p.

"Arrangement is very excellent... A number of new remedies have been included and a number of prescriptions have been increased." H. K.

*Journal of the American Pharmaceutical Association*, June 1917, p.590. 1 col.

"Gives in convenient and condensed form information that is not readily available in other books and certainly is valuable not only to dispensers but students."

*Midland druggist and pharmaceutical review*, July 1917, p.258.  $\frac{1}{2}$  p.

"The most complete text we know of on the subject... The book is quite a useful one to students and practitioners and one can find or base the action of any combination that can be devised." G. B. K.

**Russell, E. J.**

Soil conditions and plant growth. Ed.3. 243 p. 1917. Longmans, 6s. 6d. net.

*Nature*, Aug. 2, 1917, p.444.  $\frac{1}{2}$  col.

"There is an ample bibliography, which should be invaluable to the investigator in any branch of the subject." G. W. Robinson.

**Russell, Walter M.**

Operation of gas works. Hill Pub. Co., 8s. 4d. net.

*Engineering*, July 27, 1917, p.98. 1 col.

"No detailed description of construction or discussion of the merits of competitive designs is given, and it is a little difficult to see how a manager, from the limited information supplied, is to increase and widen his knowledge of the principles and practice of gas-making, one of the objects of the manual."

**Sabin, Alvah Horton.**

Industrial and artistic technology of paint and varnish. Ed.2. 473 p. 1917. Wiley, \$3.50.

*Journal of the American Society of Mechanical Engineers*, July 1917, p.682.  $\frac{1}{2}$  col.

"Has been written to give a correct general outline of the subject, with a brief account of the modern use of paints and varnishes, and the principles involved in their fabrication and application."

**Sabin, Alvah Horton.**

Red lead and how to use it in paint. 86 p. [1917.] Author, N. Y. \$1.

*Engineering news-record*, June 21, 1917, p.602.  $\frac{1}{4}$  col.

"Presents the advantages of red lead from the viewpoint of a manufacturer's paint expert... Contains a vast amount of handy, practical information for the paint user and for the engineer who has to write painting specifications."



**Sackur, Otto.**

Text-book of thermochemistry and thermodynamics; tr. and rev. by G. E. Gibson. 439 p. 1917. Macmillan, 12s. net.

*Nature*, May 31, 1917, p.262. 1½ col.

"An exceedingly lucid exposition of the principles of thermodynamics, especially adapted for the needs of the chemist." *W. C. McC. Lewis*.

**Sales Service Company.**

Selling your services. 176 p. Sales Service Co., \$1.

*Engineering news-record*, June 21, 1917, p.604. ¼ col.

"Most engineers are unfortunately far better mentally equipped and trained to acquire valuable knowledge and experience than to dispose of it to the financial advantage of themselves. To such this little book, outlining in a clear and forceful way the elements underlying all salesmanship, written particularly for the man who has only his services to sell, will be useful and inspiring."

*Power*, Aug. 14, 1917, p.238. ¼ col.

"Should help the average man in getting into the work for which he is most naturally fitted."

*Scientific American*, June 16, 1917, p.604. ½ col.

"Full of meaty suggestions and pertinent pointers."

**Schneider, Albert.**

Bacteriological methods in food and drugs laboratories. 228 p. Blakiston, \$2.50.

*American food journal*, Aug. 1917, p.439. ⅓ col.

"Well calculated to be of real service to the laboratory worker. It presupposes a thorough knowledge of chemistry, microscopy and bacteriology."

**Schofield, A. T.**

Borderlands of science. 255 p. 1917. Cassell, 6s. net.

*Nature*, May 31, 1917, p.263. ¾ col.

"The word 'borderland' has hitherto been practically confined to a study of psychic phenomena; but here the meaning is so extended as to cover all that is obscure and unproved in any science."

**Schwarzkopf, Ernst.**

Plain and ornamental forging. 267 p. Chapman & H., 7s. net. (Wiley shop texts.)

*Ironmonger*, Aug. 11, 1917, p.45. ⅓ col.

*Practical engineer*, July 26, 1917, p.41. ½ col.

"As sound in its theory of designing as it is excellent in teaching of technique."

**Scott, Wilfred W. ed.**

Standard methods of chemical analysis. 864 p. Van Nostrand, \$6 net.

*Engineering and mining journal*, June 16, 1917, p.1,083. ½ col.

"A 'compilation of selected methods.' The subjects are presented with enough detail to make them of value to the student, while, as each chapter is the work of an expert, it is also of value to the older practicing chemist... A distinct contribution to technical literature."

*Metallurgical and chemical engineering*, June 15, 1917, p.711. ⅔ col.

"This dignified volume is intended for general reference for analytical chemists and advanced students... Part I takes up alphabetically the determination of the elements... Part II deals with special subjects... The book would have been highly satisfactory if it had ended with Part I. The second part is sketchy and less satisfactory... The book, as a whole, deserves a place in every chemical laboratory."

**Séjourné, Paul.**

Grandes voûtes. 6v. unb. 1,732 p. 1917. Tardy-Pigelet, Bourges, 250 fr. (\$50.)

*Journal of the Franklin Institute*, Aug. 1917, p.325. ⅔ p.

"M. Séjourné illustrates and discusses practically all of the important masonry and

**Séjourné, Paul**—*continued.*

reinforced-concrete arch bridges of the world, in six volumes." *J. A. L. Waddell.*

*Proceedings of the Engineers' Society of Western Pennsylvania*, June 1917, p.36. 1½ p.

"It is perhaps only once in a lifetime that an engineer has an opportunity to review such a phenomenal book...A thorough study of this treatise by a large majority of American bridge designers could not fail to improve the general appearance of our future arch-bridges." *J. A. L. Waddell.*

*Scientific American*, July 14, 1917, p.36. ½ col.

"To those American engineers who make a practice of designing reinforced-concrete bridges it is well worth the money...To a bridge engineer who reads French the tabulated data would be invaluable, for they are by far the most complete ever compiled."

**Selme, L.**

Principe de Carnot contre formule empirique de Clausius; essai sur la thermodynamique. 149 p. 1917. Dunod & Pinat, Paris, 4 fr.

*Bulletin de la Société d'Encouragement*, March-April 1917, p.444. ½ p.

*Le Génie civil*, July 7, 1917, p.16. ½ col.

**Shaw, Thomas R.**

Driving of machine tools. 220 p. Van Nostrand, \$2. (Broadway engineering handbooks.)

*American machinist*, July 12, 1917, p.87. 1 col.

"The outcome of a series of lectures on machine tools given by the author at the Royal Technical Institute at Salford, England, and its object is to present simple and rational methods of designing drives for machine tools and similar machines and to gather together such formulas, rules and data as apply to work of this kind." *Dexter S. Kimball.*

*Electrical review (London)*, July 13, 1917, p.33. ¾ col.

"An excellent review of the field outlined, and should prove of great assistance to designers, students, and others concerned with this subject."

*Industrial management*, July 1917, p.622. ¾ col.

"While primarily based on English practice, the author has drawn largely from and acknowledges his indebtedness to American machine shop practice...The calculations that are incidentally brought into the text are of the simplest, and no knowledge of advanced mathematics is required...While by no means an exhaustive treatise, it may be fairly classified as a useful engineering handbook."

*Ironmonger*, Aug. 11, 1917, p.45. ¼ col.

"Here is a book which has come none too soon, indeed it is perhaps overdue. It is devoted exclusively to the means whereby power is transmitted to, and through, the mechanical parts which operate machine tools...Some of this information...has not hitherto been included in books of reference, and Mr. Shaw deserves thanks for bringing it together."

*Mechanical engineer*, July 27, 1917, p.529. ½ col.

"Gives some simple and rational methods of arranging machine tool drives, together with the necessary formulæ, rules and data."

**Shepard, George H.**

Application of efficiency principles. 368 p. Eng. Mag., \$3 net.

*Publishers' weekly*, Aug. 18, 1917, p.573. 1 col.

"Just how much of immediate practical value the executive will get from this book depends largely upon the state of efficiency of his business...A good sort of work for an executive to read, mark and pass about among his understudies."

**Sherbow, Benjamin.**

Making type work. 129 p. Century, \$1.25 net.

*Publishers' weekly*, Aug. 18, 1917, p.572. ½ col.

**Shipley, A. E.**

Studies in insect life, and other essays. 338 p. 1917. T. F. Unwin, 10s. 6d. net.

*Nature*, May 24, 1917, p.244. ¾ col.

"Based on previously published essays and lectures, has eleven chapters, dealing with insects and war, honey-bees, humble-bees, wasps, the depths of the sea, fisheries, Sir John Murray, grouse-disease, zoology in the time of Shakespeare, the revival of science in the seventeenth century, and hate."

**Simon, W. & Base, Daniel.**

Manual of chemistry. Ed. II. 648 p. 1917. Baillière, 18s.

*Chemical news*, July 20, 1917, p.36.  $\frac{1}{4}$  col.

"Many alterations and improvements have been made, and students of pharmacy, dentistry, and medicine will find it an invaluable guide... Thoroughly deserves the confidence it has inspired, and... will, undoubtedly, be as highly valued as its predecessors."

**Skinner, Walter Robert, comp.**

Mining annual and mining year book for 1917. 960 p. Financial Times, 15s. net.

*Canadian mining journal*, Aug. 15, 1917, p.327.  $\frac{1}{4}$  col.

"Is consulted in all parts of the world for information on mines."

*Metallurgical and chemical engineering*, July 1, 1917, p.44.  $\frac{1}{4}$  col.

"Thirty-first consecutive yearly issue of this valuable handbook of mining companies, engineers and directors... The number of companies listed is 1,710 and a supplementary list gives references to former volumes on 2,286 additional companies."

**Skinner, Walter Robert, comp.**

Oil and petroleum manual for 1917. 8th annual issue. 214 p. Author, London, 2s. 6d. net.

*Colliery guardian*, May 25, 1917, p.1,002.  $\frac{1}{4}$  col.

*Iron and coal trades review*, June 1, 1917, p.637.  $\frac{1}{4}$  col.

"The only annual now published dealing with the oil industry. It contains full particulars, officially verified, of 545 British and foreign oil and petroleum companies in all parts of the world."

**Smith, A.**

General chemistry for colleges. Ed. 2. 662 p. 1916. G. Bell, 6s. 6d. net.

*Nature*, June 28, 1917, p.343. 1 col.

"The whole volume bears the impress of the wide range of knowledge and the gift of clear exposition which belong to the author, and it will be widely used and read both by teachers and by students of chemistry." *T. M. L.*

**Smith, Charles Marquis.**

Electric and magnetic measurements. 373 p. 1917. Macmillan, 10s. 6d. net.

*Nature*, July 19, 1917, p.401.  $\frac{3}{8}$  col.

"Consists partly of lectures and partly of laboratory exercises... The lengthy definitions and explanations of units will be helpful to students." *A. Russell.*

**Smith, J. S.**

Trench warfare; a manual for officers and men. 144 p. Dutton, \$1.50 net.

*Engineering news-record*, July 19, 1917, p.127.  $\frac{1}{2}$  col.

"Engineer officers particularly can profit by Lieutenant Smith's book for naturally it relates more to the construction, maintenance and equipment of trenches and trench accessories than to their tactical and strategic employment... Gas warfare has an important place in the book."

**Smith, W. Horace.**

Guide to draftsmanship. 59 p. Spon, 2s. 6d. net.

*Journal of the Royal Society of Arts*, June 22, 1917, p.555.  $\frac{1}{2}$  col.

"This little handbook is practical and to the point... Specially designed for the use of architects, civil and mechanical engineers and surveyors, and contains information on instruments and materials, tracing, colouring, lettering, etc."

*Practical engineer*, July 26, 1917, p.41.  $\frac{1}{4}$  col.

"Though largely addressed to the beginner, there is much to be picked up in these pages even by the experienced draughtsman."



**Snedden, David.**

Problems of secondary education. 333 p. Houghton.

*General science quarterly*, May 1917, p.247. ¼ p.

"Three chapters...are in the form of letters written respectively to teachers of physics and chemistry, to teachers of biology and to general science teachers...No progressive science teacher will fail to read these chapters and to meditate thereon." *W. G. W.*

**Snyder, William H.**

First year science. 470 p. Allyn.

*General science quarterly*, May 1917, p.246. ⅓ p.

"An attempt to unify the elements of some ten special sciences." *R. E. N.*

**Spooner, Henry J.**

Engineering workshop drawing; first steps in engineering drawing. Longmans, 1s. 6d. net.

*Electrical review (London)*, June 8, 1917, p.632. 7 l.

"Cheap and workmanlike book that cannot fail to be of value to all engaged in learning the elements of their profession in the engineering workshop courses of our technical institutes."

**Spooner, Henry J.**

Industrial fatigue in its relation to maximum output. Co-partnership, 6d. net.

*Journal of the Royal Society of Arts*, June 22, 1917, p.555. ¾ col.

"In a brief space an excellent summary of all that has been written on the relation of industrial fatigue to output...Professor Spooner draws attention to the steps taken by Mr. Frank Gilbreth and others in the direction of eliminating needless muscular motions...Contains...useful suggestions in connection with the provision of suitable employment for disabled soldiers."

**Sprague, Ernest H.**

Elements of graphic statics. Scott, Greenwood, 4s. net.

*Iron and coal trades review*, Aug. 3, 1917, p.121. ½ col.

"Excellent little text-book."

**Starr, Louis.**

The adolescent period; its features and management. 192 p. 1915. Blakiston, \$1.

*Social hygiene*, July 1917, p.384. 1 p.

"Outline of the physical and psychical changes of adolescence in simple terms for the ordinary reader...A concise, well-balanced discussion of his subject, but it is too abstract, and lacks concrete illustrations."

**Steele, J. E.**

Naval architecture. pt.1. Cambridge University Press, 5s. net.

*Engineer*, Aug. 3, 1917, p.101. ⅓ col.

"Should be of great assistance, not only to students for whom it is primarily intended, but to all those who desire an introduction to the mysteries of naval architecture and shipyard work...As an introduction to its subject it is one of the best we have seen."

*Practical engineer*, Aug. 2, 1917, p.53. ¼ col.

"Author intends this first part to cover a first-year course in practical shipbuilding, theoretical naval architecture, and ship drawing...He has taken the ordinary merchant vessel as a type, and proceeds in eight brief chapters to describe each stage in its planning and construction."

**Stein, Milton F.**

Water purification plants and their operation. 258 p. Wiley, \$2.50.

*American food journal*, June 1917, p.331. ¼ col.

"Wherever the subject is of immediate interest Mr. Stein's book should be on hand. It supplies just the sort of data which is necessary to a clear comprehension of water purification in all of its many aspects."

**Steinmetz, Charles P.**

Theory and calculation of electric currents [circuits?]. 361 p. McGraw, \$3.

*Electrical world*, July 7, 1917, p.24. ½ col.

"Partly dealing with direct-current and partly with alternating-current phenomena... Well adapted for use as a text-book for advanced students of electrical engineering or for reference by advanced practitioners."

**Stern, Frances, & Spitz, G. P.**

Food for the worker; the food values and cost of a series of menus and recipes for seven weeks, with a foreword by L. B. Mendel. 131 p. 1917. Whitcomb & B., \$1 net.

*Journal of home economics*, Aug. 1917, p.387. 2 col.

"The nutritive value of the recipes in *Food for the Worker* is determined first by dietary standards and second by what the average unskilled laborer in a typical American city can pay on a pinch." *Caroline L. Hunt*.

*Science*, July 6, 1917, p.18. ½ col.

"In this volume are found 120 household receipts, with their food values, and the arrangement of these receipts into different menus of balanced rations for use during a period of forty-nine days." *Graham Lusk*.

**Stobbs, Thomas.**

Stobbs' wire and sheet gage tables and metal calculator. 95 p. Spon, \$1.25.

*Machinery*, July 1917, p.1,038. ½ col.

"Comprehensive and valuable to all needing an authoritative set of gage tables in English, metric and foreign sizes."

**Stronck, Hubert N. & Billyard, J. R.**

Efficient purchase and utilization of mine' supplies. 97 p. Wiley, \$1.25 net.

*Engineering news-record*, June 21, 1917, p.604. ¼ col.

"Dealing more extensively with the utilization than with the purchase of supplies, this book contains many suggestions for handling the business of storekeeping on construction work. Many of the methods outlined, however, are valuable only in handling very large stocks... Outlines the modern filing, record and index systems suited to the use of a purchasing office and storekeeping organization."

*Mining and scientific press*, July 21, 1917, p.110. ½ col.

"Most useful to mine superintendents who wish to handle their mine-supplies in a methodical and economical manner... There are numerous styles of blank forms for all purposes connected with the warehouse and stock-rooms of a mine, and many valuable suggestions to the store-keeper and accountant."

**Stuart, Edwin R.**

Topographical drawing. 119 p. McGraw.

*Engineering news-record*, Aug. 16, 1917, p.325. ½ col.

"Should make a broad appeal to instructors, students and draftsmen... Simple, clear and practical."

**Symons, William L.**

Law of patents for designs. 134 p. Byrne, \$3.

*India rubber world*, Aug. 1917, p.657. ½ col.

"Treats in a simple concise manner the practice which obtains in the prosecution of applications for design patents in the United States Patent Office as shown by the rules and decisions."

**Taylor, Frederick W.**

La taille des métaux; traduction française par L. Descroix. 296 p. Dunod & Pinat, Paris, 16 fr.

*Le Génie civil*, July 7, 1917, p.16. ½ col.

**Taylor, Frederick W. & Thompson, S. E.**

Concrete, plain and reinforced. Ed.3. 885 p. Wiley, \$5.

*Railway age gazette*, July 27, 1917, p.134. ½ col.

"New edition brings the work up to date with the latest developments in the design and construction of plain and reinforced concrete."

**Taylor, William Thomas, & Braymer, D. H.**

American hydroelectric practice. 439 p. McGraw, \$5 net.

*Electrical review* (Chicago), Aug. 11, 1917, p.243. 1 col.

"Admittedly a 'compilation of useful data and information' relating to hydroelectric systems in America... Whole pages, and even sections, are reproduced verbatim from the original sources... but the selections have been made with judgment, and the book as a whole is a wonderfully well balanced and useful work of reference." *Alfred Still.*

*Engineering news-record*, Aug. 16, 1917, p.323. 2¾ col.

"Much reliance should not be placed on the material in the book without independently checking its accuracy." *Lewis F. Moody.*

**Theophrastus.**

Enquiry into plants, and minor works on odours and weather signs. English tr. by Sir Arthur Hart. 2v. 1916. Putnam, 5s. net each. (Loeb classical library.)

*Nature*, June 7, 1917, p.282. 1½ col.

"Contains a large amount of information, often of a vague and discursive and hearsay character... We can heartily recommend the book to all who are interested in the history of botany, or in the details of Greek life three hundred years B. C." *E. F.*

**Thomas, M. Edgar, & Nichols, C. E.**

Reinforced-concrete design tables. 208 p. McGraw, \$3 net.

*Concrete*, June 1917, p.244. ½ col.

"Prepared to supply the need for a handy volume to be used by the concrete designer as the handbooks of the steel manufacturers are used by the steel designers."

*Engineering news-record*, June 21, 1917, p.602. ½ col.

"Complete and easy of reference."

**Thompson, C. Bertrand.**

How to find factory costs. 191 p. 1917. Shaw, \$3.

*Journal of the American Society of Mechanical Engineers*, July 1917, p.682. ½ col.

"Author has endeavored to make this book broad enough to apply to all kinds of industries, and it is intended to be useful to the accountant as well as the factory head."

**Thomson, William Rowan.**

Rowan premium bonus system of payment by results. 100 p. 1917. McCorquodale, 5s. net.

*Engineer*, July 27, 1917, p.80. 2 col.

"The premium system in skilful hands could be just as well, and just as profitably, used in the manufacture of cakes or shirts as in the making of steam engines and machine tools."

*Mechanical engineer*, July 27, 1917, p.529. ¾ col.

"Some means must be found for stimulating and increasing the productive capacity of our industrial resources, and this handbook will, we believe, prove of some assistance in the solution of this difficult problem."

**Thornton, W. W.**

The law of pure food and drugs. 1,113 p. 1912. Anderson Co., \$7.50.

*American food journal*, Aug. 1917, p.439. ½ col.

"All the data bearing on the national pure food laws, and the regulations under which they are enforced, that existed up to the time that the book went to press... Well indexed both topically and by chapters."



**Tilden, Sir William Augustus.**

Chemical discovery and invention in the twentieth century. 487 p.  
1917. Routledge, 7s. 6d. net.

*Analyst*, June 1917, p.223. 1 p.

"A book of outstanding merit, in which the difficulties which must be faced in writing a truly scientific and yet at the same time a popular account of the subject have been successfully overcome." *G. G. Henderson*.

*India rubber world*, July 1917, p.592. ½ col.

"One of the most distinguished chemists of Great Britain and professor emeritus of chemistry in the Imperial College of Science and Technology, presents a thrilling account of the momentous conquests of matter by human knowledge during the past quarter century."

**Tire rate book.** 196 p. Class Jnl., \$.50 a year.

*India rubber world*, July 1917, p.592. ¼ col.

"Published in January, May and September of every year. This convenient handbook for tire manufacturers, dealers and garage offices gives the sizes and prices of the different motor car tires in all their models."

**Tissot, C.**

Manuel élémentaire de télégraphie sans fil. 414 p. Challamel, Paris.

*Revue générale de l'électricité*, July 28, 1917, p.122. ¾ col.

**Todd, John A.**

The world's cotton crops. 460 p. Macmillan, \$4.25.

*India rubber world*, July 1917, p.592. ¾ col.

"Gives an account of the sources and varieties of raw cotton in non-technical language for the average grower and consumer, telling the former of the final destination and use of his crop and his rivals in other countries, and informing the latter of the conditions under which his raw material is produced and how to estimate future prospects and determine the possibilities of new sources of supply."

**Toumey, James W.**

Seeding and planting; a manual for the guidance of forestry students, foresters, nurserymen, forest owners and farmers. 455 p. 1916. Wiley, 16s. 6d. net.

*Journal of the Royal Society of Arts*, May 25, 1917, p.499. 1 col.

"It is obvious that the problems of forestry must vary greatly...but certain general principles may be laid down which are applicable to the science as a whole. These are stated in a lucid and readable form by Mr. Toumey, whose work should prove a valuable text-book to those for whose use it is intended."

*Nature*, July 26, 1917, p.422. 1½ col.

"The best text-book on a forestry subject which has yet appeared in America... Purports...to deal with the operations of sowing and planting trees, but is wider in its scope, being a manual on afforestation in general."

**Treadwell, F. P.**

Analytical chemistry. Ed.4 tr. and rev. from 8th German ed. by W. T. Hall. v.1: Qualitative analysis. 538 p. 1916. Wiley, \$3 net.

*Analyst*, July 1917, p.256. 2½ p.

"We have here an admirable work on qualitative analytical chemistry, based upon physical theories, such a work as may be commended confidently to every serious student of chemistry." *J. H. B. Jenkins*.

*Journal of physical chemistry*, June 1917, p.524. ½ p.

"Admirable companion book for the excellent text on quantitative analysis by the same authors. It strikes a happy medium between the ponderous reference text and the too abbreviated laboratory manual." *G. E. F. Lundell*.

**Troup, R. S. ed.**

Work of the Forest department in India. Superintendent, Government Printing, Calcutta, 4 annas.

*Journal of the Royal Society of Arts*, July 13, 1917, p.600. 1¼ col.

"Total forest area of British India is approximately 250,000 square miles...The problems of the Forest Department are therefore many and various."

**Turner, Charles C.**

Aircraft of to-day; a popular account of the conquest of the air. 315 p. 1917. Seeley, 5s. net.

*Journal of the Royal Society of Arts*, May 25, 1917, p.498. 1 col.

"The book is essentially a popular one; it is not a handbook on flying, and though it will be read with interest by experts, it is intended not for them, but for the numerous public who have neither scientific knowledge nor practical experience."

**Tuttle, Lucius.**

Theory of measurements. 303 p. Author, Jefferson Medical College, \$1.25.

*Science*, July 27, 1917, p.89. 1 7/8 col.

"Meets the needs of students in elementary physics more adequately than any other text that has come to the reviewer's attention... The treatment presupposes no training in mathematics beyond that usually required for admission to college." *A. de Forest Palmer.*

**United States—Coast and geodetic survey.**

Use of mean sea level as the datum for elevations, by Lester E. Jones. 1917. U. S. Government. (Special publication 41.)

*Science*, Aug. 17, 1917, p.164. 3/4 col.

"A very strong case in favor of the adoption of a single datum for the elevations of the country in order to eliminate the confusion which results from the employment of arbitrary planes of reference." *William Bowie.*

**United States—Forest service.**

Some public and economic aspects of the lumber industry, by William B. Greeley. 1917. U. S. Government. (Report 114.)

*Journal of forestry*, May 1917, p.628. 5 1/2 p.

"Summary of an extensive investigation... Impossible to touch on the many important points that it covers... To be well informed in their field foresters or lumbermen must without question be familiar with this report." *B. P. K.*

**United States Steel Corporation.**

Methods for the commercial sampling and analysis of coal, coke and byproducts. 91 p. The Corporation, \$1.50 net.

*Coal age*, Aug. 18, 1917, p.290. 3/8 col.

"Represents a great deal of labor on a subject about which not much has been written... Compiled by a sub-committee headed by... J. R. Campbell."

**University of Pennsylvania. See Pennsylvania University.**

Ventilation laws in the United States. Ed.3. 178 p. Heating and Ventilating Mag. Co., \$1.

*Heating and ventilating magazine*, July 1917, p.51. 1/2 col.

*Journal of the American Society of Heating and Ventilating Engineers*, July 1917, p.640. 1 p.

"Contains also the board of health requirements and the regulations of the National Board of Fire Underwriters, together with the model ventilation requirements as promulgated by The American Society of Heating and Ventilating Engineers."

**Villavecchia, V. and others.**

Trattato di chimica analitica applicata. 719 p. Hoepli, Milan, 18.50 lire.

*Journal of the Society of Chemical Industry*, July 16, 1917, p.738. 1/2 col.

**Waddell, J. A. L.**

Bridge engineering. 2v. 2,177 p. 1916. Chapman & H., £2, 2s.

*Engineer*, June 8, 1917, p.523. 3/4 col.

"Our considered opinion of 'Bridge Engineering' is very much higher than the first impression, and we think Mr. Waddell's book will be appreciated by those who read it carefully."

**Wade, W. L. ed.**

The flying book; the aviation world who's who, individual directory and vade mecum. New ed. 291 p. Aviation, 3s. 6d.

*Aeronautics*, July 18, 1917, p.61.  $\frac{3}{4}$  col.

Too elementary, incomplete and inaccurate.

*Practical engineer*, July 26, 1917, p.41.  $\frac{3}{4}$  col.

**Walsh, Joseph J.**

Mining and mine ventilation; a practical handbook on the physics and chemistry of mining and mine ventilation. 187 p. Van Nostrand, \$2.

*Journal of the American Society of Heating and Ventilating Engineers*, April 1917, p.465.  $\frac{1}{2}$  p.

"An important addition to the literature on ventilation, as too little of the character of this work has been presented on the very important subject of Mine Ventilation."

**War flying, by a pilot. Murray, 1s. net.**

*Aeronautics*, July 18, 1917, p.61. 8 l.

"A nice, harmless little book enough, and makes quite pleasant reading. More than that it would be difficult to say."

**Waterbury, L. A.**

Stresses in structural steel angles, with special tables. 77 p. 1917. Wiley, \$1.25.

*Mining and scientific press*, June 30, 1917, p.936.  $\frac{1}{2}$  col.

"Characterized by a practical, clean-cut discussion, and by a systematic, well-arranged set of tables, all which should commend it as a valuable office-assistant to the designer of steel structures."

*Railway age gazette*, June 29, 1917, p.1,470.  $\frac{1}{4}$  col.

**Waterhouse (Frank) & Company.**

Pacific ports; ed.3, ed. by Welford Beaton. 500 p. 1917. Terminal Pub. Co., \$3 net.

*American industries*, Aug. 1917, p.42.  $\frac{3}{8}$  col.

"Has been fairly well brought up to date in its specialties."

*International marine engineering*, July 1917, p.320.  $\frac{1}{2}$  col.

"A commercial geography, a commercial dictionary, a transportation guide and a marine manual in one volume."

*Railway age gazette*, July 20, 1917, p.96.  $\frac{1}{4}$  col.

"Commercial geography, commercial dictionary, transportation guide and marine manual of the Pacific ocean with full information for importers and exporters... Covers the ports of the Pacific, not only from Alaska to Central and South America, but also in Australia, Japan and the east coast of Asia to Siberia. It gives descriptions of the countries and harbors on the Pacific, details as to the steamer routes and information regarding the harbors, harbor dues, shipping regulations and consular documents required."

**Watson, John.**

British and foreign marbles and other ornamental stones. Cambridge University Press, 5s. net.

*Geological magazine*, July 1917, p.328.  $\frac{1}{4}$  p.

"Companion volume to the same author's well-known *Building Stones*, and it shows the same scholarship and regard for accuracy that characterized the earlier catalogue... The work will appeal very strongly to the architect, and to the geologist who is interested in the application of rocks to decorative purposes."

**Weaver, Erasmus M.**

Notes on military explosives. Ed.4, rev. & enl. 436 p. Wiley, \$3.25 net.

*Chemical engineer*, July 1917, p.179.  $\frac{1}{2}$  col.

"Each class of explosives receives full attention, and there are also copious remarks on storage, handling, service tests, etc."



**Weber, Rudolph H. & Gans, Richard.**

Repertorium der physik. v.1, ed.2. 614 p. Teubner, Leipzig.

*Electrical world*, Aug. 18, 1917, p.312.  $\frac{1}{4}$  col.

"Of value to the advanced student of physics and physical chemistry who is familiar with the German language."

**Wellman, Mabel Thacher.**

Food study; a textbook in home economics for high schools. 324 p. 1917. Little, \$1.

*Journal of home economics*, July 1917, p.344. 1 col.

"Does not try to cover the whole subject of food, shelter, and clothing. It is a carefully worked out presentation of the subject of food, based on the underlying principles of food preparation... The writer feels that it is a most valuable contribution and recommends it to all interested in high school or normal school work." *Jenny H. Snow.*

**West, G. S.**

Algae. v.1. 475 p. 1916. Cambridge University Press, 25s. net. (Cambridge botanical handbooks.)

*Nature*, May 31, 1917, p.261.  $\frac{3}{4}$  col.

"The greater part of the work deals with the green Algae, a group to the investigation of which, especially the fresh water forms, the author has devoted many years of thorough and painstaking research, and on the taxonomy of which he is one of the first authorities."

**Weston, Robert S. & Turner, C. E.** See **Massachusetts Institute of Technology.**

**Wheldale, Muriel.**

Anthocyanin pigments of plants. 318 p. 1916. Cambridge University Press, 15s. net.

*Nature*, May 31, 1917, p.261.  $\frac{5}{8}$  col.

"The author is one of a number of recent workers who have raised the study of the coloring matters of plants from an empirical chemical examination of their nature and reactions... to an important position in the study of inheritance."

**Whipple, George Chandler.**

State sanitation; a review of the work of the Massachusetts state board of health. v.1. 387 p. Harvard Univ. Press, \$2.50.

*Engineering news-record*, July 19, 1917, p.130.  $\frac{5}{8}$  col.

"Word pictures of the leading members and officers of the board, and... abstracts of the most notable of the board's publications."

**White, E. F.**

White's vest pocket sundaes formulary. 200 p. Spatula, \$1.

*American journal of pharmacy*, Aug. 1917, p.374.  $\frac{3}{4}$  p.

"A dispenser who wishes to get out of the ruts will find this unusual book just the thing to help him accomplish his object."

*Journal of the American Pharmaceutical Association*, Aug. 1917, p.768.  $\frac{1}{2}$  col.

"For the preparation of plain and fancy sundaes and the manufacture of dressings and toppings, arranged in alphabetical order... Over 1,500 formulas."

**Wigmore, John H. and others, ed.**

Science and learning in France, with a survey of opportunities for American students in French universities. 1917. Society for American Fellowships in French Universities.

*American journal of pharmacy*, Aug. 1917, p.372. 1  $\frac{1}{2}$  p.

"To show the status of France in the forefront of the world's progress and to furnish American university students all information bearing on graduate work in France." *H. K.*

**Williams, B. G. R.**

Practical urinalyses. 139 p. 1916. Mosby, \$1.

*American journal of public health*, June 1917, p.573. ½ p.

"As it is admittedly incomplete and offers practically nothing new, we do not see the reason for its appearance." *H. W. Watters*.

**Williams, Clement C.**

Design of railway location. 517 p. 1917. Wiley, \$3.50 net.

*Canadian engineer*, June 28, 1917, p.544. 2 col.

"Problems arising in the location of electric railways are quite different from those of steam railway location, and might well be left for a book dealing entirely with electric railways. . . In general, the book attempts to cover too broad a field." *William C. Willard*.

**Williams, Hall V.**

New tinsmith helper and pattern book. 354 p. 1915. U. P. C. Book Co., \$2.

*Boiler maker*, Aug. 1917, p.232. ½ col.

"The book, with the exception of a single chapter, which has been rearranged and amplified, and possibly some fifty pages of problems and tables, is entirely new."

**Willis, B. F.**

Oxyacetylene welding and cutting. 180 p. Author, St. Louis, \$50.

*American machinist*, Aug. 9, 1917, p.262. ½ col.

"Very practical little handbook. . . written from the experience of ten years in the welding business. It is arranged in the form of questions and answers, which is, perhaps, its chief drawback."

**Winslow, Kenelm.**

Prevention of disease. 1916. Saunders, \$1.75 net.

*Saint Paul medical journal*, May 1917, p.164. ½ col.

"Will prove valuable to educators and instructive in general welfare work. . . A book for the well man, that he may remain well." *W. D. Beadie*.

**Winton, Andrew L.**

Course in food analysis. 252 p. 1917. Wiley, \$1.50 net.

*American food journal*, Aug. 1917, p.439. ¼ col.

"Designed to serve as a text book to be used with classes from which will be recruited professional food analysts."

*American journal of pharmacy*, Aug. 1917, p.371. 1½ p.

"The object of the book is to equip the chemical student so as to become a professional food analyst. . . The selection of material is excellent and there is a very happy combination of microscopical technique and chemical methods of analysis." *Henry Kraemer*.

*Journal of the American Chemical Society*, Aug. 1917, p.1,785. ¾ p.

"Forty carefully selected experiments for the purpose of obtaining analytical skill and at the same time a knowledge of the composition of food products."

**Wood, Casey Albert.**

Fundus oculi of birds, especially as viewed by the ophthalmoscope; a study in comparative anatomy and physiology. 181 p. 1917. Lake-side, \$12.50 until March 15, 1918, then \$15.

*Auk*, July 1917, p.350. 2 p.

"Deals mainly with the fundus oculi, or the back part of the eye, as viewed through the pupil by means of the ophthalmoscope, and presents in the main observations of the eyes of living birds, although studies have also been made of prepared specimens of birds' eyes and eyes of birds recently dead as well as microscopic studies of the tissues." *W. S.*

**Wood, Casey Albert, and others, ed.**

Eye, ear, nose and throat. 355 p. Year Book Pub. Co., \$1.50. (Practical medicine series, 1917, v.3.)

*Saint Paul medical journal*, Aug. 1917, p.262. ½ col.

"In the opinion of the reviewer this little work deserves the most careful reading." *Paul D. Berrisford*.

**Wood, Harold Bacon.**

Sanitation practically applied. 473 p. Wiley, \$3 net.

*Canadian engineer*, July 26, 1917, p.79.  $\frac{3}{4}$  col.

"Primarily intended for the health officer and for the student of public health topics, but the employer, the employee, the teacher, the man in his own home or office or the municipal official may get some practical directions from it." *R. O. Wynne-Roberts.*

*Engineering news-record*, Aug. 16, 1917, p.326.  $\frac{5}{8}$  col.

"The fundamental principles, and to a considerable degree the practice as well, of public health and sanitation are here presented in a sane and readable way."

**Woodworth, Joseph.**

L'outillage américain pour la fabrication en série; ed.2, tr. by Maurice Varinois. 458 p. 1916. Dunod & Pinat, Paris, 22 fr.

*Bulletin de la Société d'Encouragement*, March-April 1917, p.445.  $\frac{3}{4}$  p.

*L'Industrie électrique*, May 10, 1917, p.178.  $\frac{1}{2}$  col.

**Woolsey, Theodore S. jr.**

French forests and forestry. Wiley, \$2.50.

*American forestry*, Aug. 1917, p.504.  $\frac{1}{2}$  col.

"Embodies the results of a study of the more important phases of forest practice in Corsica, Algeria and Tunisia...Author has...aimed to set forth the essentials of French methods which might be applied directly in the United States...A most valuable contribution."

**Yearbook** of wireless telegraphy and telephony. 5th annual ed. 900 p. Wireless Press, 3s. 6d.

*Engineer*, June 22, 1917, p.570.  $\frac{1}{2}$  col.

"Contains an immense mass of information which is not only useful to those whose business is concerned with wireless telegraphy, but interesting...to the general public as well."

**Yoder, Jacob H. & Wharen, G. B.**

Locomotive valves and valve-gears. 272 p. Van Nostrand, \$3 net.

*Power*, Aug. 21, 1917, p.273.  $\frac{3}{8}$  col.

"An everyday reference book for the average mechanic employed in railroad shops...Few books that come to our notice show equal thoroughness and painstaking care in preparation."

*Railway and locomotive engineering*, Aug. 1917, p.277.  $\frac{3}{4}$  col.

"While the matter and style is primarily adapted for the use of the practical shop man, there is much information that is of benefit to the draftsman and designing engineer...One of the most important contributions to the locomotive engineering literature of our time."

**Yorke, J. Paley.**

Elementary physics for engineers. 165 p. 1916. Cambridge University Press, 4s. net.

*Nature*, June 28, 1917, p.343.  $\frac{3}{8}$  col.

"The matter is readable and the statements clear and concise...Compared with some introductory books of physics which have appeared in recent years, the treatment is somewhat sparse."

**Young, Lewis Emanuel.**

Mine taxation in the United States. 275 p. University of Illinois, \$1.50.

*Engineering and mining journal*, June 16, 1917, p.1,083. 9 l.

"Presented as a report upon the experience of the important mining states in taxation of mines and mineral lands. The investigation of the historical data of the laws was begun in 1910, and an effort has been made to include all important material published prior to November, 1916."



**Young, Robert B.**

The basket; a study of the auriferous conglomerates of the Witwatersrand and the associated rocks. 140 p. Gurney & J., 8s. 6d. net.

*Mining magazine*, June 1917, p.319. 1½ col.

"The conglomerates responsible for the world's greatest goldfield are naturally worthy of close attention from the point of view of the geologist and mineralogist...A highly interesting account of the basket, easily intelligible to anyone with an elementary knowledge of geology." *Arthur Holmes*.

**Zimmer, George Frederick.**

Mechanical handling of material, and its national importance during and after the war. Lockwood, 10s. 6d. net.

*Engineer*, Aug. 3, 1917, p.101. ½ col.

"In no field probably is there a bigger opportunity for...economising human labour than that of handling material...A very valuable guide to what has already been done in this direction."

*Iron and coal trades review*, July 13, 1917, p.38. ½ col.

"Re-issue in a more handy form of a series of articles contributed to 'Cassier's Engineering Monthly' last year by a well known expert, who, as the author of a previous treatise on 'The Mechanical Handling and Storing of Material' has already made his mark in the literature of this branch of industry."

## Publications of the Library now in Print

Where two prices are given, the first is that for which the publication is sold at the Library only. All prices are strictly net, except for individual publications ordered in lots of twenty or more. Remittances must be made in advance, payable to Carnegie Library of Pittsburgh. All publications not marked \* may be had free at the Library, or will be sent postpaid for 5 cents each.

### \*Classified Catalogue of the Carnegie Library of Pittsburgh.

FIRST SERIES, 1895-1902. 1907. vol. 1-3. 3,890 pp. \$12.00.

SECOND SERIES, 1902-1906. 1908. vol. 4-5. 2,020 pp. \$5.00.

THIRD SERIES, 1907-1911. 1914. vol. 6-8. 3,475 pp. \$8.00.

Bound in buckram with gilt tops. Include full author and subject indexes.

### *The same* [in pamphlet form].

FIRST SERIES, 1895-1902. 10 parts. 1903-07.

Part 1. General Works. 1907. 67 pp. 10 cents, postpaid.

Part 2. Philosophy and Religion. 1903. 223 pp. Out of print.

Part 3. Sociology and Philology. 1904. 340 pp. 15 cents; postpaid, 25 cents.

Part 4. Natural Science and Useful Arts. 1904. 598 pp. 35 cents; postpaid, 50 cents.

Part 5. Fine Arts. 1905. 351 pp. 15 cents; postpaid, 25 cents.

Part 6. Literature. 1905. 308 pp. 15 cents; postpaid, 25 cents.

Part 7. Fiction. 1906. 446 pp. 25 cents; postpaid, 40 cents.

Part 8. History and Travel. 1907. 691 pp. 50 cents; postpaid, 65 cents.

Part 9. Biography. 1907. 381 pp. 20 cents; postpaid, 30 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1907. 850 pp. \$1.00; postpaid, \$1.20.

SECOND SERIES, 1902-1906. 5 parts. 1907-08.

Part 1. General Works, Philosophy, Religion, Sociology and Philology. 1907. 425 pp. Out of print.

Part 2. Natural Science, Useful Arts and Fine Arts. 1907. 477 pp. 45 cents; postpaid, 60 cents.

Part 3. Literature, English Fiction and Fiction in Foreign Languages. 1908. 342 pp. 40 cents; postpaid, 50 cents.

Part 4. History and Travel, Collected Biography and Individual Biography. 1908. 465 pp. 45 cents; postpaid, 60 cents.

Part 5. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1908. 460 pp. 80 cents; postpaid, 95 cents.

THIRD SERIES, 1907-1911. 10 parts. 1912-14.

Part 1. General Works, Philosophy, Religion. 1912. 372 pp. 40 cents; postpaid, 50 cents.

Part 2. Sociology, Philology. 1912. 418 pp. 45 cents; postpaid, 60 cents.

Part 3. Natural Science, Useful Arts. 1913. 623 pp. 60 cents; postpaid, 75 cents.

Part 4. Fine Arts. 1913. 237 pp. 25 cents; postpaid, 35 cents.

Part 5. Literature. 1913. 271 pp. 30 cents; postpaid, 40 cents.

Part 6. English Fiction, Fiction in Foreign Languages. 1913. 294 pp. 30 cents; postpaid, 40 cents.

Part 7. History and Travel. 1914. 401 pp. 40 cents; postpaid, 50 cents.

Part 8. Biography. 1914. 276 pp. 30 cents; postpaid, 40 cents.

Part 9. Books for the Blind. 1914. 44 pp. 5 cents; postpaid, 10 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1914. 816 pp. 80 cents; postpaid, \$1.00.

**Monthly Bulletin.** 50 cents a year, postpaid.

Not published in August and September.

**Annual Reports, 1st-21st.** 1897-1917. Sent free upon request.

Except the 3d, 6th and 20th, which are out of print.

**Catalogue of the Carnegie Library School; a Training School for Children's Librarians.** Sent free upon request.

**Periodicals and Other Serials Currently Received by the Carnegie Library of Pittsburgh.** 7th edition. 1915. 42 pp.

- Books in the Library of the American Philatelic Society. 1910. 20 pp.  
 Carnegie Institute and Library of Pittsburgh. 1916. 32 pp.  
 Gift of the German Emperor [List of Books, Maps and Photographs].  
 1908. 17 pp.  
 Rules for Filing Cards in the Dictionary Catalogues of the Carnegie  
 Library of Pittsburgh. 2d edition. 1917. 32 pp.  
 What a Public Library Finds to Do; by Elisa May Willard. 1917. 18 pp.

## Reference Lists

### History

- Books of Interest in Connection with the European War. 1914. 26 pp.  
 Braddock's Expedition. 11 pp. (Monthly Bulletin, Nov. 1906.)  
 Expedition of General Forbes against Fort Duquesne. 1908. 20 pp.  
 Expeditions of Colonel Bouquet to the Ohio Country, 1763 and 1764.  
 11 pp. (Monthly Bulletin, Dec. 1909.)  
 Letters of General Forbes; Reprint of 35 Letters Relating to the Ex-  
 pedition against Fort Duquesne. 63 pp. 20 cents, postpaid.  
 (Monthly Bulletin, Feb.-May 1909.)  
 \*Pennsylvania; a Reading List for the Use of Schools, with Special  
 Reference to Indian Warfare and the Local History of Pitts-  
 burgh. 1911. 83 pp. 20 cents; postpaid, 25 cents.  
 Pittsburgh in 1816. 1916. 75 pp.  
 Washington's Visits to Pittsburgh and the Ohio Country. 15 pp.  
 (Monthly Bulletin, Feb. 1908.)  
 The Whiskey Insurrection. 9 pp. (Monthly Bulletin, July 1906.)

### Biography

- Famous Royal Women; a Reading List for Girls. 1908. 11 pp.  
 Lives and Letters; a Selected and Annotated List. 1910. 36 pp.  
 \*Men of Science and Industry; a Guide to the Biographies of Scientists,  
 Engineers, Inventors and Physicians, in the Carnegie Library of  
 Pittsburgh. 1915. 189 pp. 20 cents; postpaid, 30 cents.  
 Patriots; a Reading List for Boys and Girls. 1912. 17 pp.

### Sociology

- Housing. 1912. 45 pp.  
 Vocational Guidance. Supplement. 10 pp. (Monthly Bulletin, Dec.  
 1915.)

### Debating

- \*Debate Index. 2d edition. 1912. 84 pp. 15 cents; postpaid, 20 cents.  
 Debate Index. Supplement. 1913. 23 pp.  
 Debate Index. Second supplement. 1916. 15 pp.  
 Debate Index. Third supplement. 1917. 14 pp.

### Publications of Interest to Engineers

- Air-Brakes. 1915. 55 pp.  
 Air Conditioning. 1914. 58 pp.  
 Brick Manufacture and Bricklaying. 26 pp. (Monthly Bulletin, Jan.  
 1912.)  
 By-Product Coking. 1915. 40 pp.  
 Electric Driving in Rolling-Mills and Foundries. 11 pp. (Monthly  
 Bulletin, Nov. 1907.)  
 Electric Heating and Cooking. 1910. 16 pp.  
 Engineering Ethics. 1917. 17 pp.  
 Floods and Flood Protection. 48 pp. (Monthly Bulletin, July 1908.)  
 Floods and Flood Protection. Supplement. 1911. 19 pp.



- 154
- The Gyroscope.** 1917. 23 pp.
- Housing.** 1912. 45 pp.
- \***Index to Proceedings of the Engineers' Society of West Virginia,** Volumes 1 to 20, 1880-1904; Compiled by Harrison Craver. 1906. 144 pp. \$1.00 postpaid.
- \***Index to the Classified Catalogue of the Technology Department.** 2d edition. 1916. 63 pp. 10 cents.
- List of Technical Indexes and Bibliographies Appearing Serially.** 1910. 17 pp.
- \***Men of Science and Industry;** a Guide to the Biographies of Scientists, Engineers, Inventors and Physicians, in the Carnegie Library of Pittsburgh. 1915. 189 pp. 20 cents; postpaid, 30 cents.
- Metal Corrosion and Protection.** 2d edition, revised and enlarged. 58 pp. (Monthly Bulletin, July 1909.)
- Mica.** 12 pp. (Monthly Bulletin, Oct. 1908.)
- One Hundred Recent Books on Agriculture.** 1910. 19 pp.
- Refuse and Garbage Disposal.** 1909. 39 pp.
- Road Dust Preventives.** 1916. 39 pp.
- Scientific and Technical Reference Books.** 19 pp. (Monthly Bulletin, Nov. 1916.)
- \***Sewage Disposal and Treatment.** 1910. 96 pp. 15 cents, postpaid.
- Smoke Prevention.** 18 pp. (Monthly Bulletin, May 1907.)
- Sodium Nitrate Industry of Chile.** 7 pp. (Monthly Bulletin, March 1908.)
- Steam Turbines.** 21 pp. (Monthly Bulletin, Nov. 1904.)
- \***Technical Book Review Index,** v.1, no.1-5, March-Oct. 1917. 50 cents a year, postpaid.  
No.1-3, March, April, May, published in the Monthly Bulletin of those months, 5 cents each, postpaid.  
No.4-5, July-Oct. issued separately, 15 cents each, postpaid.
- Trees and Forestry.** 1917. 18 pp.
- Water Softening.** 8 pp. (Monthly Bulletin, June 1904.)

### Library Work with Children

- \***Catalogue of Books, Annotated and Arranged, and Provided by the Carnegie Library of Pittsburgh for the Use of the First Eight Grades in the Pittsburgh Schools.** 1907. 331 pp. 35 cents; postpaid, 50 cents.
- \***Annotated Catalogue of Books Used in the Home Libraries and Reading Clubs.** 1905. 110 pp. 20 cents; postpaid, 25 cents.
- Illustrated Editions of Children's Books.** 1915. 20 pp.

### Story-Telling

- Stories from the Ballads of Robin Hood; Outlines for Story-Telling.** 1914. 38 pp.
- Stories from the Norse; Outlines for Story-Telling.** 1914. 22 pp.
- \***Stories to Tell to Children.** 1916. 68 pp. 25 cents.
- Story Hour Courses for Children from Greek Myths, The Iliad and The Odyssey.** 1906. 32 pp.

### Reading Lists

- Famous Royal Women; a Reading List for Girls.** 1908. 11 pp.
- "Foreign Lands Where Wonders Are."** 1911. 14 pp.
- Patriots; a Reading List for Boys and Girls.** 1912. 17 pp.
- \***Pennsylvania; a Reading List for the Use of Schools, with Special Reference to Indian Warfare and the Local History of Pittsburgh.** 1911. 83 pp. 20 cents; postpaid, 25 cents.

# TECHNICAL BOOK REVIEW INDEX

131

ISSUED BY THE TECHNOLOGY DEPARTMENT OF THE  
CARNEGIE LIBRARY OF PITTSBURGH

VOL. 1

DECEMBER 1917

No. 6



PITTSBURGH  
CARNEGIE LIBRARY  
1918

136





## Preface

This index, printed from part of a card-index maintained by the Carnegie Library of Pittsburgh, is a record of certain book reviews appearing in the scientific, technical and trade journals currently received in the Technology Department. It is concerned mainly with books on pure and applied science, but includes a few on allied subjects. Its purpose is primarily to *index* reviews rather than to compete with any existing booklist by suggesting books on any subject, or by furnishing bibliographic information. In accordance with this plan, the arrangement is by authors, though the form of entry, being determined from the review and not from the book itself, is in some cases doubtless incorrect.

Except for the correction of obvious errors, the bibliographic information is as given in the review, or as combined from two or more reviews when several are indexed. Since many of the reviews are carelessly done, the information given is, in many cases, both inaccurate and incomplete. In general the names of publishers are abbreviated in accordance with the practice in the more important book-trade bibliographies. Titles of journals are as a rule given in full.

Each quotation immediately follows the name of the journal from which it is taken. Obviously these brief extracts, thus detached from the context, must not be accepted as conclusive. Very often a review is so equivocal that there can be no unanimity of opinion as to whether it is favorable or unfavorable. For this reason no estimate is given here. Except for this one omission, this index is an exact copy of cards filed in the book review index of the Carnegie Library of Pittsburgh.

The first three issues of the Technical Book Review Index were included in the Monthly Bulletin—appearing in the numbers of March, April and May respectively. Subsequent issues were published separately in July and October; and the present issue (December) completes the reviews in the journals received during 1917.

Notices of a few recent journals, reviewed during 1917, appear at the end of the present issue.

The price of the Index is fifty cents for the year, this to include the three numbers published in the Bulletin and the three separate numbers.

The "Technical Book Review Index," published in April and July 1915 by the Index Office, Inc., Chicago, consisted of a record of technical book reviews furnished by the Carnegie Library of Pittsburgh.



## Technical Book Review Index

**Abt, Isaac.**

The baby's food. Saunders, \$1.25.

*American journal of nursing*, Nov. 1917, p.174. 5 l.

"The small size and concise style should secure for it a ready acceptance."

**Agg, T. R.**

Construction of roads and pavements. 432 p. McGraw, \$3 net.

*Concrete*, Oct. 1917, p.126.  $\frac{3}{4}$  col.

"Intended primarily for use as a text in a two- or three-hour course in roads and pavements but numerous tables and typical designs and specifications have been included that should add to its value as a reference book for highway engineers."

**Alford, L. P.** See **Manufacture** of artillery ammunition.

**Allen, Alfred Henry.**

Commercial organic analysis. Ed.4, v.9, ed. by W. A. Davis. 836 p. 1917. Blakiston, \$5 net.

*American journal of science*, Nov. 1917, p.400.  $\frac{1}{4}$  p.

"An important feature of the volume is a complete general index to the whole series of nine volumes." *H. L. W.*

*Chemical news*, Nov. 23, 1917, p.257.  $\frac{1}{4}$  col.

"Completes the fourth edition...and brings up to date the preceding eight volumes, which have been issued at intervals during the last eight years...It is possibly unnecessary to allude to the many excellences of this treatise, which has been thoroughly tested and proved by analytical chemists of all nations, and it will be sufficient to say that this volume in no way falls below the level of its predecessors."

**Allen, C. Frank.**

Business law for engineers. [443 p.] McGraw, \$3.

*Electric railway journal*, Nov. 10, 1917, p.884. 9 l.

"An instructive as well as an entertaining book on the important fundamental features of law that an engineer should understand."

*Engineering news-record*, Nov. 15, 1917, p.940.  $\frac{1}{3}$  col.

"Divided into two parts, one entitled 'The Elements of Law for Engineers' and the second called 'Contract Letting'...Throughout...a remarkably simple and clear system of arrangement is used, and the value is enhanced by well-thought-out typography."

*Railway review*, Dec. 29, 1917, p.804.  $\frac{1}{3}$  col.

"Author's standing and experience may be taken as assurance that the purpose of his effort in compiling this book, is being attained."

**Allinson, May.**

Dressmaking as a trade for women in Massachusetts. 180 p. 1916.

Women's Educational and Industrial Union, \$80.

*Journal of home economics*, Nov. 1917, p.528. 2 col.

"While the subject matter is interesting and well-organized from the sketch of the evolution of trade through the discussions of the industrial, economic, and educational aspects of its conduct in Massachusetts to summary and outlook, the reader needs to bear in mind that it is all of interest as historical matter only." *Florence E. Leadbetter.*

**American bureau of shipping, Great Lakes department, 1917. 1917.**

American Bureau of Shipping, \$25.

*International marine engineering*, Oct. 1917, p.463.  $\frac{1}{3}$  col.

"Formerly known as the *Great Lakes Register*...Contains complete lists of steam and sailing vessels on the Great Lakes, giving main particulars of both the hull and machinery, as well as the names of the builders, owners, date of construction, etc. At the end...are given a list of American owners and managers and also a list of Canadian owners and managers...Supplements are issued during the year."



**American fertilizer handbook.** 1917. Ware Bros. Co., Philadelphia, \$1.

*Journal of industrial and engineering chemistry*, Sept. 1917, p.918. ⅓ col.

"Contains very complete statistics covering production, imports, consumption and prices of fertilizer ingredients for the past year and the consumption of fertilizers by states for the years 1909 to 1916 inclusive. As a reference book this volume is very valuable." *F. B. Carpenter.*

**American Gas Institute.**

Gas chemists' handbook. 354 p. 1916. The Institute, \$3.50.

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820. ⅓ col.

"Presents methods for sampling and testing the materials used in gas manufacture."

**American hardware jobbers' directory and trade name index.** 214 p.

Edward G. Baltz, \$1.50.

*India rubber world*, Dec. 1917, p.159. ⅓ col.

**American Institute of Chemical Engineers.**

Bulletin no. 15: Symposium on potash recovery. 122 p. The Institute.

*India rubber world*, Nov. 1917, p.94. 10 l.

"Particularly interesting, showing how our chemists are succeeding in securing potash from natural sources in this country, an industry which has been of great value now that foreign sources of supply are unavailable."

**American Locomotive Company.**

Locomotive hand-book. 195 p. The Company, New York, \$75.

*Railway and locomotive engineering*, Dec. 1917, p.413. 1 col.

"A valuable contribution to railroad literature...Compiled with rare skill and ability."

*Railway mechanical engineer*, Nov. 1917, p.611. ⅓ col.

"Much time and a great deal of care has been exerted in the compilation of the information published in this book and it will be of considerable assistance to railroad men interested in locomotive design."

**American Medical Association—Propaganda department.**

Miscellaneous nostrums. Ed.3. 127 p. The Association, \$15.

*Pennsylvania medical journal*, Sept. 1917, p.850. ⅓ col.

"Gives information, brief in some instances, extensive in others, about products that are worthless or dangerous, sold under claims that are misleading or false."

**American Medical Association—Propaganda department.**

Nostrums for kidney diseases and diabetes. 47 p. The Association, \$10 postpaid.

*Pennsylvania medical journal*, Nov. 1917, p.120. ⅓ col.

**American Pharmaceutical Association.**

Year book, 1915. v.4. 572 p. 1917. The Association, \$4 net.

*Druggists circular*, Sept. 1917, p.487. ⅓ col.

"A ready reference text book of matter describing the more recent advances in these allied lines."

*Midland druggist and pharmaceutical review*, Sept. 1917, p.362. ⅓ p.

"Object...is to show in concise form the new discoveries and progress made in pharmacy for the year." *A. G. B.*

**Annual chemical directory of the United States; ed. by B. F. Lovelace.** 305 p. 1917. Williams & Wilkins Co., \$5.

*Gas age*, Oct. 15, 1917, p.344. ⅓ col.

"Contains practical data and lists that will undoubtedly be appreciated by a study of its contents...An alphabetic arrangement adds to the convenience of the reader in the construction of the lists."

*Journal of industrial and engineering chemistry*, Dec. 1917, p.1156. ⅓ col.

"Consists of two complete lists, one being a list of American manufacturers of chemicals and dealers in chemicals, and the second a list of American manufacturers of and dealers in apparatus and equipment for laboratories and industrial plants." *J. E. Teeple.*

**Annual** chemical directory of the United States—*continued*.

*Pharmaceutical journal and pharmacist*, Nov. 10, 1917, p.223.  $\frac{1}{2}$  col.

"The information it contains is drawn directly from authoritative sources, and the result is a work which is probably more comprehensive and accurate than any other publication of its kind."

**Armsby, H. P.**

Nutrition of farm animals. 743 p. 1917. Macmillan, 11s. net.

*Nature*, Nov. 8, 1917, p.184.  $1\frac{1}{2}$  col.

"There has been no fundamental upheaval since the last edition of his earlier book appeared, but there have been remarkable changes in details, and in consequence the picture is now very different from what it was."

**Army, Henry V.**

Principles of pharmacy. Ed.2, rev. 1056 p. Saunders, \$5.50 net.

*Midland druggist and pharmaceutical review*, Sept, 1917, p.361.  $\frac{1}{3}$  p.

"Explanations here given are most simple and very clear... We consider it an ideal text for the student in pharmacy and a decided aid to the pharmaceutical chemist, especially those who desire to more completely study the recent synthetic products." G. B. K.

**Arrowood, Milton W.**

Refrigeration. 280 p. 1917. Am. Technical Soc., \$1.50.

*Ice and refrigeration*, Sept. 1917, p.108.  $\frac{1}{2}$  col.

"Evidently intended for students... Mainly a compilation of the principal known data regarding mechanical refrigeration... The principles... are given very briefly... A very good text book for the beginner."

**Assheton, Richard.**

Growth in length; embryological essays. 104 p. 1916. Cambridge University Press, 2s. 6d. net.

*Science progress*, July 1917, p.175.  $\frac{1}{2}$  p.

"The lectures are extremely interesting." C. H. O'D.

**Attwood, Edward Lewis.**

War-ships; a text-book on the construction, protection, stability, turning, etc. of war vessels. Ed.6, rev. 338 p. 1917. Longmans, \$4 net.

*Industrial management*, Oct. 1917, p.158.  $\frac{1}{4}$  col.

"A treatise on design and construction of war vessels, in addition to the general questions of framing, armor and capabilities at sea."

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820.  $\frac{1}{4}$  col.

**Austin, Frank Eugene.**

Directions for designing, making & operating high-pressure transformers. Ed.2. 1917. 46 p.

Binder's title reads "How to make high-pressure transformers."

*Canadian engineer*, Sept. 27, 1917, p.286.  $\frac{1}{2}$  col.

"Sets forth in a brief and simple manner the general principles underlying the design of transformers... On the whole will prove very useful to anyone desiring to make a transformer for his own use." Alfred S. L. Barnes.

*Power*, Sept. 11, 1917, p.373.  $\frac{1}{4}$  col.

"Gives directions for designing, constructing and operating small high-voltage transformers... Intended for the experimenter who wishes to construct his own apparatus."

*Scientific American*, Nov. 3, 1917, p.340. 14 l.

**Austin, Frank Eugene.**

Examples in battery engineering. 90 p. 1917. Author, Hanover, N. H., \$1.25.

*Mining and scientific press*, Dec. 29, 1917, p.948.  $\frac{1}{2}$  col.

"One of the practical little books on electricity for which Professor Austin has already acquired a wide reputation... Battery-engineering offers an opportunity to develop and to store energy where at present it is allowed to go to waste... It is a suggestive and interesting little book."

*Railway signal engineer*, Aug. 1917, p.227.  $\frac{1}{2}$  col.

"Presents in a simple and understandable form the fundamental principles involved in the use of primary and storage batteries."

**Austin, Frank Eugene**—*continued.*

*Scientific American*, Nov. 3, 1917, p.340.  $\frac{1}{2}$  col.

"In the form of lessons that state fundamental principles and encourage the scientific conservation of power."

**Austin, Frank Eugene.**

Preliminary mathematics. 169 p. Author, Hanover, N. H., \$1.20.

*Electrician*, Dec. 7, 1917, p.342.  $\frac{2}{3}$  col.

"Author has carefully selected the subject matter so that the work will be found particularly useful to the pupils of the eighth grade in American schools and of the 'Junior High School.'" B. W. C.

*Journal of the Western Society of Engineers*, Oct. 1917, p.584.  $\frac{2}{3}$  p.

"Has attempted to span the entire range of preliminary mathematics, from the simplest notation, through arithmetic, decimals, fractions and elementary algebra... About one-half of the book is of especial value to pupils up to and including the eighth grade, while the latter half will be of assistance to pupils in the high school. A valuable feature is the inclusion of the examination questions in algebra, mathematics, etc., for various schools and colleges." C. A. M.

**Bacon, Raymond F. & Hamor, W. A.**

American petroleum industry. 2v. 963 p. 1916. McGraw, \$10 net.

*Journal of physical chemistry*, Nov. 1917, p.705.  $1\frac{1}{2}$  p.

"Purpose...has been to produce a treatise which would present a comprehensive survey of the American petroleum industry, distinctly modern in every respect, and suitable not only as a general reference work for those engaged in the industry but also as a text-book for students of petroleum engineering." Wilder D. Bancroft.

**Bailey, E. H. S.**

Text-book of sanitary and applied chemistry; or, The chemistry of water, air and food. Ed.4, rev. 394 p. 1917. Macmillan, \$1.60.

*Journal of physical chemistry*, Dec. 1917, p.787.  $2\frac{1}{2}$  p.

*Journal of the American Chemical Society*, Sept. 1917, p.2094.  $\frac{1}{2}$  p.

"For its presentation of the practical problems concerned with heating, ventilating, lighting, cleaning, bleaching, etc., and with water and foods, Professor Bailey's book is one of the best of the elementary works which deal with the chemistry of every-day life in the home."

*Science*, Nov. 30, 1917, p.540.  $\frac{1}{2}$  col.

"Object...is to furnish a text, for the use of students, upon chemistry as applied to the most important topics having to do with daily life in the household...Descriptive only and does not cover analytical processes." W. P. Mason.

**Baldt, Laura I.**

Clothing for women. 454 p. Lippincott, \$2.

*Scientific American*, Dec. 29, 1917, p.504.  $\frac{1}{2}$  col.

"To the woman who aspires to express her artistic ideas in the clothes she wears, with the incidental saving of money, this work offers a thorough course of instruction."

**Bangay, R. D.**

Elementary principles of wireless telegraphy. Ed.2, pt.2. 241 p. Wireless Press, 2s.

*Electrician*, Dec. 7, 1917, p.345.  $\frac{1}{2}$  col.

**Barbillion, L.**

Leçons sur le fonctionnement des groupes électrogènes en régime troublé. 306 p. 1915. Gauthier-Villars, Paris, 11 fr.

*Nature*, March 1, 1917, p.2.  $\frac{3}{4}$  col.

"A thorough and well-reasoned discussion...Too mathematical to be properly understood by the ordinary English engineer, but to the specialist and the advanced student it will be interesting and instructive...Founded on a course of lectures given by the author to technical students. It illustrates well the great practical value of mathematics to engineers." A. Russell.

*Physical review*, Nov. 1917, p.589. 9 l.

"Discusses from the theoretical standpoint the perturbations of prime movers of all kinds and of direct and alternating current generators, due to variations of velocity or of load, and the different methods of regulation." E. P. L.



**Barker, Harry.**

Public utility rates. 387 p. 1917. McGraw, \$4.

*Canadian engineer*, Sept. 27, 1917, p.284. 1 col.

"To consulting engineers, public commissioners, company officials and to students of municipal affairs this volume seems destined to render a real service." *George T. Clark*.

*Electric review (Chicago)*, Dec. 15, 1917, p.1034. 1 col.

"Reviewer was impressed with the analytical power, unbiased viewpoint, and clearness of statement evident on every page. Throughout...there are evidences of pains-taking care in the preparation and the formulation of the material...No manager of a public utility, nor any one who has to do with utility problems, can afford to be ignorant of its contents." *C. M. Jansky*.

**Barney, William Joshua, comp.**

Selected bibliography on ports and harbors; their administration, laws, finance, equipment and engineering. 144 p. American Association of Port Authorities, \$1.

*Engineering news-record*, Nov. 15, 1917, p.940. ¼ col.

"A most valuable reference for engineers engaged in this kind of work...Gives references to periodicals and books under a number of headings."

*Le Génie civil*, Dec. 8, 1917, p.384. ½ col.

Contains 2563 references.

**Barrow, Isaac.**

Geometrical lectures of Isaac Barrow; tr. by J. M. Child. 218 p. 1916. Open Ct., 4s. 6d. net.

*Nature*, Nov. 22, 1917, p.222. 1¼ col.

"Mr. Child may be heartily congratulated on the result of his six months' research." *G. B. M.*

**Bastin, S. L.**

How to know the ferns. 136 p. 1917. Methuen, 1s. 6d. net.

*Nature*, Aug. 9, 1917, p.463. ½ col.

"Contains descriptions of the British ferns and their allies, prefaced by an account of ferns in general and an outline of their classification...A trustworthy and up-to-date addition to the many popular accounts of British ferns." *C. H. W.*

**Battle, John Rome.**

Lubricating engineer's handbook. 333 p. 1916. Lippincott, \$4 net.

*Electric railway journal*, Nov. 10, 1917, p.884. ¼ col.

"Should...prove suggestive to every electric railway man who has to do with the lubrication of motors, compressors, machine tools, power-house machinery, etc."

*Ice and refrigeration*, Nov. 1917, p.203. ½ col.

"This excellent volume...is a valuable addition to the literature on oils and lubrication...Will be found decidedly helpful in engine room as well as office."

*Journal of the American Society of Naval Engineers*, Nov. 1917, p.830. ¾ p.

"Should prove of interest to an engineer in any branch of mechanical work...Contains a great deal of practical data which would make it of value to the operating engineer. It might have a wider field of usefulness were more technical data contained in the volume."

*Journal of the Western Society of Engineers*, Oct. 1917, p.584. ¾ p.

"Not technical, and yet it covers the field most thoroughly...A most complete index makes it easy to refer to any subject or process, while an appendix contains much valuable general information." *C. A. M.*

*Metal industry*, Nov. 1917, p.491. ½ col.

"We have no hesitation in saying that it will be found of great help to designers of machinery, operating engineers, owners, general managers, purchasing agents, lubricating oil salesmen and manufacturers of lubricants."

*Sibley journal of engineering*, Nov. 1917, adv. sec., p.23. ¼ col.

"To combine the manufacturing of lubricants with their satisfactory application... The extensive field...has been thoroughly covered."

**Bauer, L. A. and others.**

Ocean magnetic observations, 1905-1916, and reports on special researches. 447 p. 1917. Carnegie Institution of Washington, \$10.

*Journal of the Franklin Institute*, Dec. 1917, p.917.  $\frac{1}{2}$  p.

"A lucid and complete account of the magnetic surveys of the ocean conducted by the Carnegie Institution on the two vessels, the *Galilee* and its successor, the *Carnegie*. The observing instruments are discussed and portrayed, the methods of observation and reduction are stated, specimen observations are given, and extensive tables present the final results... Splendidly illustrated." *George F. Stradling*.

*Science*, Oct. 5, 1917, p.342. 2 col.

"Third of the series issued by the department of terrestrial magnetism of the Carnegie Institution and contains full reports of all the magnetic work of the department at sea during the past eleven years... A monument to the well-directed enthusiasm and foresight of Dr. Bauer and to the skill and zeal of his associates." *H. A. Bumstead*.

**Bayley, Thomas.**

.Pocket-book for chemists. Ed.8, ed. by Robert Ensoll. 425 p. 1917. Spon, 7s. 6d. net.

*Analyst*, Sept. 1917, p.319.  $\frac{1}{2}$  p.

*Chemical news*, Aug. 24, 1917, p.95.  $\frac{1}{3}$  col.

"Is conveniently and well arranged, and will be found a reliable and useful guide in the laboratory."

*Nature*, Aug. 23, 1917, p.503.  $\frac{3}{4}$  col.

"Has been very carefully edited and is likely to maintain the utility of the earlier editions." *C. A. K.*

**Bayley, William Shirley.**

Descriptive mineralogy. 542 p. 1917. Appleton, \$3.50 net.

*Mining and scientific press*, Oct. 6, 1917, p.524. 1 col.

"A comprehensive view of modern mineralogy... Type is good, the cuts are clear and sharp, and the book is a convenient size. Anyone interested in mineralogy should have it on his shelf." *F. H. M.*

*Scientific American*, Dec. 22, 1917, p.488.  $\frac{1}{2}$  col.

"Purely a text for college classes, comprehensive rather than detailed... Lavishly illustrated throughout with diagrammatic drawings and photographic reproductions."

**Beckwith, E. G. A. ed.**

Military expressions in English, French and German. 76 p. 1915. Hachette, 1s. 6d.

*Scientific American*, Dec. 22, 1917, p.488. 1 l.

**Benn, Ernest J. P.**

The trade of to-morrow. 232 p. Jarrold, 2s. 6d. net.

*Electrician*, Oct. 5, 1917, p.14. 1 col.

"Outline sketch for commercial reconstruction... Central idea is the promotion of Trade Councils... Distinctly educative, for it makes the reader think." *J. E. K.*

*Engineering review*, Aug. 15, 1917, p.60.  $\frac{1}{2}$  col.

"Shows a considerable amount of industry, a wide knowledge of the subject and displays the smartness indulgently tolerated in the clever but inexperienced young man by his elders. Cocksure general statements of doubtful validity abound in the book." *W. S. M.*

*International marine engineering*, Sept. 1917, p.413.  $\frac{1}{3}$  col.

"As an Englishman, Mr. Benn naturally looks at the subject from the point of view of his own country, but the subject is covered in such a broad manner as to make the book of universal value."

*Ironmonger*, Nov. 10, 1917, p.56.  $\frac{1}{3}$  col.

"Seems to suggest the comfortable thought that the war is nearly over, and that we can settle down calmly to consider plans for reconstructing British trade."

**Berg, Ernest Julius.**

Electrical engineering; advanced course. 330 p. 1917. McGraw, \$3.50 net.

*Engineering-education*, Oct. 1917, p.95. 7 l.

"Abnormal or transient conditions in electric circuits are treated mathematically in a manner thoroughly intelligible to the technical graduate. A really advanced book on practical electrical engineering problems." *H. E. D.*

**Bergtold, W. H.**

A study of the incubation periods of birds; what determines their lengths? 109 p. Kendrick.

*Bird lore*, Sept.-Oct. 1917, p.278. 1 col.

"More information concerning this fascinating and important subject than has before been available in a single volume...Marks the starting-place for all future investigators." *F. M. C.*

**Berlese, Antonio.**

Insetti delle case e dell' uomo e malattie che diffondono. 293 p. 1917. Hoepli, Milan, 4.50 lire.

*Nature*, Nov. 1, 1917, p.164. ½ col.

"Deals with the insects and arachnids found in Europe attacking man or damaging his food and belongings."

**Besley, F. W.**

The forests of Maryland. Maryland State Board of Forestry, Baltimore.

*American forestry*, Dec. 1917, p.761. ⅓ col.

"Information useful to the forest owner, the timber buyer, the manufacturer and the student...Purpose...is to show in condensed form and orderly manner the state's forest wealth, its value to the people, and how the resources may be best conserved by wise use for supplying present needs and the needs of the future...Interesting and of practical value."

**Billings, Frank.**

Focol infection. 1916. Appleton, \$2. (Lane medical lectures.)

*Saint Paul medical journal*, Oct. 1917, p.324. ⅓ col.

"The author is an enthusiast...and some of the statements...might be criticised." *J. S. Gilfillan.*

**Billings, Frank, & Raulston, B. O. ed.**

General medicine. 1917. Year Book Pub. Co., \$1.50. (Practical medicine series, v.6.)

*Saint Paul medical journal*, Dec. 1917, p.381. 9 l.

"The small size of the book, under competent editorial [sic] supervision makes it valuable for ready reference on the subjects discussed." *Jennette M. McLaren.*

**Blair, Thomas S.**

Botanic drugs; their materia medica, pharmacology and therapeutics. 1917. Therapeutic Digest Pub. Co., \$2.

*Saint Paul medical journal*, Oct. 1917, p.324. ¼ col.

"Emphasizes the importance of the use of the entire drug...A rational and timely plea for the use of proved drug medication." *C. B. Drake.*

**Blaisdell, J. G.**

Exercise and review book in biology. 160 p. 1917. World Book Company, \$.80.

*Scientific American*, Dec. 22, 1917, p.488. 10 l.

"A novel and most convenient arrangement that meets the requirements of the Regents of the University of the State of New York, and is adapted to any of the State first-year high-school courses."

**Blue book textile directory, 1917. 1917. Davison Pub. Co., \$5.**

*Posselt's textile journal*, Sept. 1917, p.xvii. ⅓ col.

"A complete reference book to all the cotton, woolen, silk, jute, flax and linen mills in the United States and Canada, together with dyers, bleachers and print works, commission merchants, converters and other textile establishments."



**Bôcher, Maxime.**

Leçons sur les méthodes de Sturm dans la théorie des équations différentielles linéaires, et leurs développements modernes, professées à la Sorbonne en 1913-1914; collected and ed. by Gaston Julia. 267 p. 1917. Gauthier-Villars, Paris, 12 fr.

*Science progress*, Oct. 1917, p.344. ½ p.

"A very well written introduction to the interesting methods first developed by Sturm in a memoir published in 1836 for the discussion of what are now known as boundary value problems with ordinary differential equations...Is one of M. E. Borel's famous series of monographs on the theory of functions." *Philip E. B. Jourdain*.

**Bolton, Reginald Pelham.**

A municipal experiment. 236 p. Bureau of Public Service Economics, Inc., New York.

*Heating and ventilating magazine*, Nov. 1917, p.59. ¼ col.

"Presents in detail the results of the well-known tests [Hall of Records Power Plant, New York City]...to determine whether or not it was more economical to install an independent power plant...or to purchase electric current from an outside source."

**Bonnier, Gaston.**

Name this flower; a simple way of finding out the names of common plants without any previous knowledge of botany. 1917. Dutton, 6s. net.

*Nature*, Sept. 6, 1917, p.5. ¼ col.

"Prof. Bonnier by his exhaustive keys, well illustrated by line drawings, enables any one to find out the names of plants without knowing anything of botany or of the principles of classification...A good deal of botanical and general information is packed into the book, and it is very well indexed."

**Borchardt, W. G.**

Revision papers in arithmetic. 156 p. 1917. Rivingtons, 2s.

*Nature*, Nov. 1, 1917, p.162. ⅓ col.

"A very useful graduated set of one hundred papers of examples on the usual course of arithmetic from the first four rules to logarithms and compound interest, and including the measurement of areas and volumes." ø.

**Boswell, P. G. H.**

Memoir on British resources of sands suitable for glass-making. 92 p. 1916. Longmans, \$50.

*Journal of physical chemistry*, Oct. 1917, p.608. ½ p.

"There are a good many interesting facts in this pamphlet, but the author too often neglects to give any theoretical explanations for his dogmatic statements." *Wilder D. Bancroft*.

*Knowledge*, Jan.-Sept. 1917, p.20. ¼ col.

"Concise summary of the conditions of our supplies of glass sands and the requirements of the manufacturers which these sands should meet...Chemical, mineral, and mechanical analyses are given, and the methods of performing the last two are fully explained." *W. H. W.*

**Bouasse, H.**

Construction, description et emploi des appareils de mesure et d'observation. 630 p. 1917. Delagrave, Paris, 25 fr.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.159. 1½ p.

**Bowen, Wilbur P.**

Applied anatomy and kinesiology. 316 p. Lea, \$3.50.

*Mind and body*, Nov. 1917, p.340. ½ p.

"Will surely soon become the standard text book for applied anatomy in many colleges. It is heartily recommended."

**Braun, Emil.**

Secrets of bread making. 194 p. 1917. Author, Dayton, Ohio.

*Scientific American*, Nov. 17, 1917, p.375. ⅓ col.

"Gives the baker all necessary chemical knowledge in a nutshell."

**Brearley, Harry.**

Heat treatment of steel. Ed.2. Longmans, 10s. 6d. net.

*Engineering*, Oct. 19, 1917. p.401. 2½ col.

"Will be found most generally useful, though other practical experts might occasionally give other advice."

**Brend, W. A.**

Health and the state. 354 p. 1917. Constable, 10s. 6d. net.

*Nature*, Oct. 4, 1917, p.82. 2 col.

"Well worthy of study. A wide range of subjects affecting public health is discussed."

**Briggs, William, ed.**

Elements of physical science. Ed.3. 168 p. 1917. Tutorial, 3s.

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, July 1917, p.27. ¾ col.

"Prepared to meet the requirements of the Matriculation and Junior Certificate Examinations of the Cape University...Generally speaking, we can heartily recommend this work." *J. A. W.*

**Broomhall, E. B. comp.**

Imperial combination code; rubber edition. 269 p. Compiler, London, \$15.

*India rubber world*, Nov. 1917, p.94. ½ col.

"Special edition of a well-known cable code in which the mining phrases of the general edition have been replaced by those particularly applicable to rubber...Has been accepted for use under the censorship regulations."

**Brown, Harold W.**

Electrical equipment; its selection and arrangement. 229 p. 1917. McGraw, \$2 net.

*Canadian engineer*, Oct. 25, 1917, p.370. ½ col.

"To aid non-electrical engineering students and mechanical engineers in applying electrical principles and data to industrial electric plants, shops, factories, mines, etc.... Is most concise, liberally furnished with small, clear sketches and diagrams arranged to suit the text, and excellently covers a great range of engineering information." *H. W. Price.*

**Brown, William Alden.**

Portland cement industry. 153 p. 1917. Van Nostrand, \$3.

*Journal of industrial and engineering chemistry*, Dec. 1917, p.1156. ¾ col.

"Gives a most comprehensive review of the entire process of cement manufacture." *C. N. Wiley.*

**Browning, Philip E.**

Introduction to the rarer elements. Ed.4. 250 p. 1917. Wiley, 7s. net.

*Analyst*, Sept. 1917, p.322. 1½ p.

"Is intended not to treat exhaustively the subject of the rarer elements, but rather to serve as an introduction to the study of an interesting group which the chemist in the inorganic field cannot afford to neglect." *E. Wechsler.*

*Chemical news*, Sept. 21, 1917, p.149. ¼ col.

"This valuable work has for some years been regarded as quite indispensable to students who are taking up the study of the rarer elements, and for those who wish to undertake research work on the subject."

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, Oct. 1917, p.112. ¾ col.

"Primarily intended for college students taking the ordinary courses of chemical instruction, and considering the length of time, which can be devoted in such a course to this work, we can have no hesitation in recommending this book, and the review questions given at the end will help to revise and consolidate the knowledge gained by its perusal and study." *J. A. W.*

*Mining magazine*, Oct. 1917, p.197. ¾ col.

"The chemistry of the rarer elements is gathered together in a convenient form... Special attention has been given to spectroscopy, and there are several spectroscopic charts and tables." *Arthur Holmes.*

**Browning, Philip E.—continued.**

*Nature*, Oct. 25, 1917, p.142. 1¾ col.

"All the rarer elements, including the rare earths and the rare gases of the atmosphere, are detailed, and a special chapter is devoted to the radio-elements." *J. H. Gardiner*.

*Revue générale des sciences pures et appliquées*, Oct. 31, 1917, p.587. ½ col.

**Brunt, David.**

The combination of observations. 219 p. 1917. Cambridge University Press, 8s. net.

*Nature*, Nov. 1, 1917, p.162. ¾ col.

"There are a great number of valuable references in the book, which is much to be commended."  $\phi$ .

*Science*, Dec. 14, 1917, p.588. 1 col.

"Gives an elementary treatment of the methods of adjusting observations... Gives a brief and simple treatment of certain important parts of the theory of statistics... Presents a treatment of the correlation of two systems of variates." *H. L. Rietz*.

*Science progress*, July 1917, p.162. ½ p.

"When the student has mastered this volume he will have obtained a sufficient groundwork to enable him to proceed to any special applications." *H. S. J.*

**Bucher, Elmer E.**

Practical wireless telegraphy; a complete text book for students of radio communication. 322 p. 1917. Wireless Press, \$1.50 net.

*Scientific American*, Nov. 3, 1917, p.340. ½ col.

"Is much more thorough than is usually the case in works addressed to the beginner... The step-by-step character of the instructions here offered insures the careful reader against running into difficulties."

**Bullens, Denison K.**

Steel and its heat treatment. Ed.2. Wiley, 17s. 6d. net.

*Iron and coal trades review*, Aug. 31, 1917, p.234. 1½ col.

"Endeavours to blend both the practical and theoretical sides of the general subject of heat treatment of steel."

**Burdick, Arthur J.**

Chemical tests for minerals. 93 p. Gateway, \$1.25.

*Engineering and mining journal*, Sept. 15, 1917, p.472. 1-7 col.

"Written chiefly for the benefit of the prospector of limited technical training. It gives simple qualitative tests that cover about everything the prospector is likely to find."

**Burket, Walter C. ed.**

Bibliography of William Henry Welch, 1875-1917, with foreword by Henry M. Hurd. 47 p. Johns Hopkins Press.

*Science*, Sept. 7, 1917, p.240. 1 p.

"The scattered scientific papers and the varied public activities of Professor Welch are here set forth, for the first time, in a strict chronological order, which will be most useful to future medical historians and biographers."

**Burnham, A. C.**

First aid and emergency treatment. Lea, \$2.

*American journal of nursing*, Nov. 1917, p.173. 6 l.

**Burns, Daniel.**

Elements of coal mining. 232 p. Longmans, \$1.10.

*Iron and coal trades review*, Sept. 28, 1917, p.358. ½ col.

"The author, who is professor of mining in the Royal Technical College at Glasgow, is a thorough master of his subject, and has produced an excellent little treatise for the purpose under consideration."

*Mining American*, Nov. 10, 1917, p.21. ¾ col.

"Author... has aimed to give a general idea of how coal occurs, how it is mined, how the miner is safeguarded while at work, and how national prosperity is largely dependent upon coal supplies."

*Mining magazine*, Oct. 1917, p.198. 4 l.

"For the benefit of young men training for superior places among coal miners."



**Burns, J. A.**

Useful engineers' constants for the slide rule. Ed.2. Author, Glasgow, 1s. net.

*Iron and coal trades review*, Sept. 28, 1917, p.358. 10 l.

"To show how the slide rule may be used to the best advantage in calculations the practical engineer has to make in every-day practice."

**Burrell, George A.**

Gasoline and how to use it. 281 p. 1916. Oil Statistical Society, \$1.50.

*Gas age*, Sept. 1, 1917, p.244.  $\frac{3}{4}$  col.

"Aims to eliminate preventable accidents...to assist the motorist in getting full measure of power...to give him information as to the running and lubrication of his automobile."

**Bush, A. D. See Potter, Samuel O. L.****Butler, G. Montague.**

Pocket handbook of minerals; designed for use in the field or classroom, with little reference to chemical tests. Ed.2. 311 p. Wiley, 11s. 6d. net.

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, Aug. 1917, p.46.  $\frac{3}{4}$  col.

"Will receive a welcome by every student of mineralogy...We have pleasure in recommending this publication to field geologists, mineralogists and all students in these subjects." *A. W.*

*Nature*, Aug. 30, 1917, p.523.  $\frac{1}{2}$  p.

"Appears on the whole to have been well done, though...there are...some points open to criticism." *J. W. E.*

**Byerly, William Elwood.**

Introduction to the use of generalised co-ordinates in mechanics and physics. 118 p. 1916. Ginn, 5s. 6d.

*Nature*, May 3, 1917, p.182.  $1\frac{1}{4}$  col.

"Sure to be welcomed, because Prof. Byerly has undoubtedly the gift of appealing successfully to the average student...In its small compass it includes a wide scope... Is so good that it deserves a much more searching criticism than the present reviewer can pretend to give." *G. B. M.*

*Science progress*, Oct. 1917, p.346.  $\frac{1}{2}$  p.

"An exceedingly valuable working text-book...marked by exceptionally good examples and summaries of the contents of chapters." *Philip E. B. Jourdain.*

**Cady, Hamilton P.**

General chemistry. 522 p. McGraw, 9s. 6d. net.

*Engineering*, Sept. 14, 1917, p.273.  $\frac{3}{4}$  col.

"Seems to be intended for the general student...Has its good points. A little more general care would have made that adjective applicable to the whole book."

**Calvert, Amelia S. & Calvert, P. P.**

A year of Costa Rican natural history. 577 p. 1917. Macmillan, \$3 net.

*Nature*, Dec. 27, 1917, p.323.  $1\frac{1}{4}$  col.

"Although so full of information, there are but few chapters to be enjoyed by the general reader, who, taking the detail, much of which is unavoidably technical, for granted, would relish some more comprehensive generalised descriptions as characteristic of the country."

*Tea and coffee trade journal*, Sept. 1917, p.230.  $\frac{1}{4}$  col.

"Pictures Costa Rica and its natural history before the influences of the Panama Canal were begun to be felt there and serves as an introduction to a fascinating country...In some of the chapters are passages describing coffee and cacao plantations and cultural methods...Deals comprehensively with the flora and fauna in non-technical language."

**Canadian mining manual**; a handbook of information concerning the minerals and mines of Canada, 1916-17; ed. by Reginald E. Hore. 448 p. Mines Pub. Co.

*Engineering and mining journal*, Dec. 15, 1917, p.1059. ¼ col.

"Gives an excellent summary of the mineral industries of Canada, with statistical reports and many notes of progress and changes made during the year."

*Iron and coal trades review*, Oct. 26, 1917, p.466. ¼ col.

"Useful handbook of information concerning the minerals and mines of Canada."

*Mining and scientific press*, Sept. 8, 1917, p.372. ½ col.

"Trustworthy compilation of information concerning mining enterprises in Canada."

**Casson, Herbert N.**

*The axioms of business*. 182 p. Efficiency Exchange, London, \$2.50.

*Printing art*, Sept. 1917, p.51. ⅓ col.

"There are sixteen axioms or chapters in the work, each containing sound arguments and suggestions."

**Castle, W. E.**

*Genetics and eugenics*; a text-book for students of biology and a reference book for animal and plant breeders. 353 p. 1916. Harvard Univ. Press, \$2 net.

*Nature*, May 10, 1917, p.202. 1¼ col.

"Evidently designed more especially for the university student. It falls roughly into three sections: an introductory portion dealing with theories of evolution and what may be termed pre-Mendelian genetics, a main part treating of contemporary genetic work, and a final section on human heredity and eugenics."

*Science progress*, Oct. 1917, p.354. ⅓ p.

"A very fair and reasonable review of our knowledge in these two fascinating fields of biological inquiry." *C. H. O' D.*

**Caziot, Pierre.**

*Expertises rurales et forestières; traité pratique d'estimation de la propriété rurale*. 400 p. 1917. J. B. Ballière, Paris, 5 fr.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.151. 1 p.

**Chapin, Henry Dwight.**

*Health first; the fine art of living*. 231 p. 1917. Century, \$1.50.

*American food journal*, Nov. 1917, p.635. ½ col.

**Chemical engineering catalog**. Ed.2. 517 p. 1917. Chemical Catalog Co.

*Gas age*, Nov. 15, 1917, p.446. ⅔ col.

"Designed to be a book of reference for chemical engineers, buyers and others seeking information on chemical and metallurgical equipment, machinery, chemicals and supplies."

**Chemical Rubber Co.**

*Handbook of chemistry and physics*. Ed.5, rev. 414 p. 1917. The Company, Cleveland, \$2.

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820. ¼ col.

"The text... has been carefully revised and brought down to date and a large number of new tables added."

*Power*, Dec. 4, 1917, p.781. ¼ col.

"Aim... is to present in one compact, easily portable volume a comparatively comprehensive reference book for use in the laboratory or classroom."

**Child, J. M.** See **Barrow, Isaac.**

**Childs, John Lewis.**

*Catalogue of the North American natural history library of John Lewis Childs, Floral Park, New York*. 150 p. 1917. John Lewis Childs, Floral Park, N. Y.

*Auk*, Jan. 1918, p.93. ¼ p.

"Handsomely printed... Of especial interest to bibliographers and to those who wish to ascertain the extent of their own desiderata." *W. S.*

**Christian, William Gay.**

Text-book of anatomy for nurses. Mosby.

*American journal of nursing*, Jan. 1918, p.359. 6 l.

"Clear, concise and comprehensive, a book well adapted to the class room for use with laboratory instruction and outside references...Illustrations are well drawn and useful."

**Christie, Clarence V.**

Electrical engineering. Ed.2. 546 p. McGraw, \$4.

*Electric journal*, Dec. 1917, adv. sec. p.38. 10 l.

"Originally compiled for a lecture course for senior and junior students in electrical engineering at McGill University."

**Cincinnati Milling Machine Co.**

Treatise on milling and milling machines. The Company, 6s.

*Iron and coal trades review*, Oct. 26, 1917, p.466.  $\frac{1}{3}$  col.

"Confines itself to the column and the knee (cantilever) type milling machines, and the smaller sizes of manufacturing millers in most general use."

**Clapham, C. B.**

Arithmetic for engineers, including simple algebra, mensuration, logarithms, graphs, and the slide rule. 436 p. 1916. Chapman & H., 5s. 6d. net.

*Nature*, Sept. 20, 1917, p.41.  $1\frac{1}{2}$  col.**Clark, A. Graham.**

Text-book on motor-car engineering. Ed.2. 2v. Constable, 8s. 6d. net each.

v.1. Construction. 437 p. 1914.

v.2. Design. 389 p. 1917.

*Nature*, Oct. 11, 1917, p.102.  $2\frac{1}{3}$  col.

"The two volumes, aptly named...might with equal pertinence have been entitled 'Elementary' and 'Advanced'...We cannot praise too highly the clearness of diction and simplicity of expression...Were it not for the illustrations, we should have been at some trouble to find any cause for criticism."

**Cleveland Engineering Society.**

The conquerors. The Society, \$.25.

*Power*, Oct. 9, 1917, p.509.  $\frac{3}{4}$  col.

"Seven well-illustrated articles or papers written by prominent engineers in popular, nontechnical terms as a means of creating general interest in the great work accomplished by engineers ancient and modern."

**Cohen, J. B.**

Class-book of organic chemistry. 344 p. 1917. Macmillan, 4s. 6d. net.

*Chemical news*, Oct. 19, 1917, p.197.  $\frac{1}{4}$  col.

"Contains a full first year's course of work in organic chemistry, and serves the double purpose of a theoretical text-book and laboratory guide...Well adapted for use in higher classes of schools as well as for the first year college students."

*Nature*, Nov. 22, 1917, p.221.  $\frac{3}{4}$  col.

"Bears, in every respect, the mark of the experienced teacher, and is most suitably adapted to the requirements of first-year medical students and of senior science students in schools, for whom it is designed." C. A. K.

**Collie, Sir John.**

Malingering and feigned sickness. Ed.2. 664 p. Longmans, \$4.50.

*Engineering news-record*, Dec. 20, 1917, p.1170.  $\frac{1}{3}$  col.

"Promises to be useful to employers who endeavor through a medical staff to keep their working force from being depleted through feigned sickness or injury—either of which is malingering...Contains valuable information for the medical branches of the army and navy. The larger part...is devoted to medical examinations and tests for many kinds of ills to which mankind is subject and which may more or less be feigned."



**Colvin, Fred H. & Viall, Ethan.**

United States rifles and machine guns. 332 p. McGraw, \$3.

*Machinery*, Jan. 1918, p.480. ½ col.

"Detailed account of the methods used in the manufacture of the Springfield 1903 model service rifle... Composed of reprinted pages from the 'American Machinist'... Goes into extreme detail... Should be of value to men responsible for the design of tools and fixtures for making Springfield model rifles."

More than 2,300 illustrations.

**Comstock, Daniel F. & Troland, L. T.**

Nature of matter and electricity. 203 p. Van Nostrand, \$2 net.

*Sibley journal of engineering*, Nov. 1917, adv. sec. p.27. ½ col.

"Gives in a broad schematic form the conception of the structure of the material universe which has developed in the minds of modern students of physical science." *J. A. B.*

**Conyngton, Thomas.**

Corporate organization and management. 760 p. Ronald, \$5.

*Journal of accountancy*, Jan. 1918, p.79. ¾ p.

"A valuable addition to the field of corporation finance. Gives in detail the working procedure for forming corporations and for managing them in accordance with legal requirements, and contains much valuable information relative to procedure in incorporating, framing the charter and bylaws, holding meetings, the rights, powers and liabilities of stockholders, officers and directors, transfer and issuance of stock, etc... Perhaps the most useful portion... is that which deals with forms and precedents. In it is such information as the corporation officer needs in his daily work."

**Coolidge, J. L.**

Treatise on the circle and the sphere. 602 p. 1916. Clarendon Press, 21s. net.

*Nature*, May 10, 1917, p.201. 1¾ col.

"A noble addition to the geometrical literature in the English language, and must have a great influence on the prosecution of the study of all countries where English is read."

**Cooper, Lenna Frances.**

How to cut food costs. 128 p. 1917. Good Health Co.

*Journal of home economics*, Sept. 1917, p.434. 1¾ col.

"To teach housewives and others charged with the task of supplying and preparing food, how they can best do this at the least money cost, and... to explain what is meant by a 'Balanced Ration' and how to provide it... While... written primarily for housewives, it contains much material of practical value to teachers." *Elizabeth W. Miller.*

**Cooper, W. R.**

Primary batteries; their theory, construction and use. Ed.2, enl. Electrician, 12s. 6d. net.

*Electrical review (London)*, Aug. 10, 1917, p.142. ¾ col.

"An entirely new chapter discusses the properties, theory, and uses of selenium."

**Copeland, Melvin T.**

Business statistics. 700 p. Harvard Univ. Press, \$3.75.

*Industrial management*, Dec. 1917, p.478. ½ col.

"This is a work bearing upon commercial and manufacturing operations... It will be found of value to advanced students in business courses, and particularly to industrial managers."

**Cotton facts.** Annual ed.42, ed. by Carl Geller. 240 p. Shepperson Pub. Co., \$1.

*India rubber world*, Jan. 1918, p.221. 12 l.

"A compilation from official and reliable sources of the crops, receipts, exports, stocks of cotton, the home and foreign consumption, visible supply and acreage, etc., as well as government crop reports, cotton mill statistics and other information regarding this important product... As a handbook for quick reference this little volume maintains the well-earned prestige of its predecessors."

**Crane, W. E.**

American stationary engineering. Ed.2. 311 p. Henley, \$2.

*Machinery*, Nov. 1917, p.282. 10 l.

"Should be found helpful by firemen and young engineers."

**Crehore, Albert C.**

The mystery of matter and energy. 162 p. Van Nostrand, \$1.

*Electrical world*, Jan. 5, 1918, p.50. ½ col.

"Designed to stimulate interest and inquiry in the physics of microcosm...To be recommended to all educated persons possessing some general knowledge of physics who are interested in the most recent investigations within the microcosmic world."

**Cremona, Luigi.**

Opere matematiche. 520 p. 1917. Hoepli, Milan, 30 lire.

*Nature*, Sept. 13, 1917, p.23. ⅝ col.

"Contains thirty-six papers, including the treatise on the general theory of surfaces, the memoir on cubic surfaces, the tract on reciprocal figures in graphical statics, and various notes on birational transformations in space." *G. B. M.*

**Croft, Terrell.**

Electrical machinery, 317 p. 1917. McGraw, \$2.

*American machinist*, Sept. 6, 1917, p.438. ¼ col.

"Aim...has been to gather for the average man in industry, material in concise and condensed form which will tell him what he needs to know about electrical machinery, and without the use of difficult mathematics."

*Electrical engineering*, Sept. 1917, p.50. ⅓ col.

"Devoid of mathematical analysis as it does not concern itself with details of design. The text is such that any one...will get the meat without much effort. It is easy reading."

**Croft, Terrell.**

Practical electric illumination. 225 p. 1917. McGraw, \$2.

*Power*, Oct. 9, 1917, p.509. ⅝ col.

"Treats the subject...from the practical standpoint rather than the theoretical, although the author has introduced theory where he considered it essential to an understanding of the practical side of the problem...Should go far in filling the needs of those who in any way have illumination problems to solve."

**Croft, Terrell.**

Practical electricity. 646 p. 1916. McGraw, \$2.50.

*Power*, Dec. 18, 1917, p.851. ¾ col.

"The primary object... is to present the fundamental facts and theories relating to electricity and its present-day applications...Secondarily, the book was designed for university graduates who desire a medium whereby they can with minimum effort review, refresh and reconstruct in line with modern theory and practice their concepts of electricity and magnetic phenomena'...Should be of value to almost everyone who is interested in the subject of electricity and magnetism."

**Croft, Terrell.**

Wiring for light and power. 426 p. McGraw, \$2.

*Electrical review (Chicago)*, Nov. 10, 1917, p.822. ½ col.

"Might equally well have been called 'The How and Why of the National Electrical Code,' since it is both a treatise on American methods of installing wiring and an itemized commentary on this code." *Albert Scheible.*

**Crowell & Murray, Cleveland.**

Iron ores of Lake Superior. Ed.3. 316 p. Penton.

*Blast furnace and steel plant*, Sept. 1917, p.436. ⅓ col.

"Should be of great interest to miners and users of Lake Superior ore, inasmuch as interesting data relative to mines has been brought up to date."

**Cumming, Alexander Charles.**

Practical chemistry for medical students. Ed.2. 165 p. 1917. Thin.

*Chemical news*, Sept. 21, 1917, p.149.  $\frac{1}{4}$  col.

"Designed especially for medical students, but might also be found suitable for general purposes."

*Journal of the American Chemical Society*, Dec. 1917, p.2756. 6 l.

"Contains a series of simple experiments in general chemistry, some work in qualitative analysis, a few pages on volumetric analysis and a very few experiments on a number of physiologically important substances." *J. H. Long.*

*Nature*, Nov. 22, 1917, p.221.  $\frac{1}{4}$  col.

"The descriptions of the experiments and of the associated details of manipulation are throughout direct and concise, so that the course should form a really practical help to the study of the general principles of chemistry." *C. A. K.*

*Pharmaceutical journal and pharmacist*, Sept. 8, 1917, p.110.  $\frac{1}{2}$  col.

"In this edition new sections have been introduced... Is also adapted to the use of a wider range of students."

**Cumming, Alexander Charles, & Kay, S. A.**

Text-book of quantitative chemical analysis. Ed.2. 402 p. 1916. Gurney & J., 9s. net.

*Science progress*, July 1917, p.166.  $\frac{1}{4}$  p.

"Any one who places a copy of this book in the hands of his students may feel assured that if they do not progress it will not be the fault of the text-book." *F. A. Mason.*

**Cushman, Robert Eugene.**

Excess condemnation. 323 p. Appleton, \$2.

*Engineering news-record*, Oct. 18, 1917, p.751.  $1\frac{1}{2}$  col.

"Deserves the careful attention of engineers and other city officials concerned in planning, financing and protecting municipal improvements, broad-minded real estate men and all who are interested in helping on the orderly and economical growth of municipal improvements."

**Dales, A. Beston, & Barnebey, O. L.**

Elementary qualitative analysis. 205 p. Wiley, \$1.25 net.

*Canadian engineer*, Sept. 27, 1917, p.286.  $\frac{1}{4}$  col.

"Covers in a brief, but thorough and systematic arrangement, the study and practical examination of bases and acids, together with much valuable information to students of practical chemistry... As a laboratory guide... is highly recommendable to students in this grade of chemistry." *C. H. Heys.*

**Darbishire, A. D.**

Introduction to a biology, and other papers. 291 p. 1917. Cassell, 7s. 6d. net.

*Science progress*, July 1917, p.172.  $\frac{1}{2}$  p.

**Daugherty, R. L.**

Centrifugal pumps. McGraw, 8s.4d. net.

*Engineering*, Aug. 24, 1917, p.208.  $1\frac{1}{4}$  col.

"Mr. Daugherty... is clearly at his best when concerned with the mathematical analysis of the subject."

**Davis, Arthur Powell.**

Irrigation works constructed by the United States government. 413 p. Wiley, \$4.50.

*Engineering news-record*, Nov. 15, 1917, p.939.  $\frac{7}{8}$  col.

"Besides its value as an account of governmental enterprise in the reclamation of land, the book is a welcome addition to the literature of irrigation, and of dams, canals, pipe lines and other structures common to hydraulic works."

**Davis, H. Valentine.**

Food gardening for beginners and experts. 1917. G. Bell, 6d. net.

*Nature*, Sept. 6, 1917, p.3.  $\frac{1}{4}$  col.

"Gives very simple directions and diagrams for arranging a plot or garden in three sections, so that each is heavily manured and limed once in three years."



**Davis, W. A.** See **Allen, Alfred Henry.**

**Davison Publishing Co.** See **Blue** book textile directory.

**Dean, Bashford.**

Bibliography of fishes; enl. and ed. by Charles Rochester Eastman. v.1: Authors' titles A-K. 718 p. 1916. Am. Museum of Natural History.

*Museums journal*, Sept. 1917, p.47. 4 l.

"First instalment (only just received in this country) of a work which will comprise a subject-index and other subsidiary matter. Begun in 1890 by Dr. Dean and completed with the aid since 1910 of the American Museum of Natural History. An invaluable aid to the student of fishes, whether recent or fossil."

**Del Mar, Algernon.**

Tube milling; a treatise on the practical application of the tube mill to metallurgical problems. 159 p. 1917. McGraw, \$2.

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, Sept. 1917, p.93. 1 col.

"Enjoys the distinction of being the first work on tube-milling ever written... Bring together significant data drawn from the experience of metallurgists all over the world... A hand book of details... that must prove useful to designers of new plants and to engineers in working out their efficiency-problems." *W. A. C.*

**Dercum, Francis X.**

Rest, suggestion and other therapeutic measures in nervous and mental diseases. Ed.2. Blakiston, \$3.50.

*American journal of nursing*, Sept. 1917, p.1242. ¼ p.

**Despaux, A.**

Qu'est-ce que l'électricité? Qu'est-ce que le magnétisme? Dunod & Pinat, Paris, 7 fr. 50.

*Moniteur scientifique*, April 1917, sup. p.32. ¾ col.

**Dewell, Henry D.**

Timber framing. 275 p. 1917. Dewey, \$2.

*Scientific American*, Dec. 15, 1917, p.468. ¼ col.

"Establishes working-values that will be appreciated by the structural engineer, at the same time admitting that certain of the theories advanced and conclusions drawn may have to be modified in the light of more extensive tests."

**Directory** of the furniture manufacturers of the United States; comp. by C. E. Spratt. 1917. N. Y. Furniture Exchange.

*Upholsterer and interior decorator*, Sept. 15, 1917, p.78. 8 l.

"Comprehensive."

**Dixie, A. E.**

Air navigaton for flight officers. 223 p. Appleton, \$4.

*Aviation*, Oct. 1, 1917, p.313. ½ col.

"Contains condensed information on the subject of aerial navigation. The subject matter is presented in a clear manner, and can be easily followed."

**Dooley, William H.**

Vocational mathematics for girls. 369 p. 1917. Heath, \$1.28.

*Journal of home economics*, Oct. 1917, p.481. 3 col.

"Might have been more valuable to the teacher if it were based on a more critical analysis of a smaller number of occupations, with a wider range of choice in problems and a more logical development of each topic." *Kathrine F. Ball.*

**Doty, Alvah H.**

Good health; how to get it and how to keep it. 304 p. Appleton, \$1.50.

*American industries*, Sept. 1917, p.42. ¾ col.

"Is excellently balanced. It is serviceable, valuable and practicable."

**Doty, Alvah H.**—*continued.*

*Iron trade review*, Dec. 27, 1917, p.1376. 12 l.

"Dr. Thomas Darlington, medical director of the American Iron and Steel institute...recommends 'Good Health' to the iron and steel industry as worthy of consideration."

**Dover, A. T.**

Electric traction. 651 p. Macmillan, \$5.50.

*Electrical record*, Nov. 1917, p.86. ¼ col.

"Deals in great detail with all matters pertaining strictly to electric railway operation."

*Electrical review (Chicago)*, Oct. 13, 1917, p.656. ½ col.

"Intended for engineers and advanced students...Contains so much valuable material that it should prove useful to the practicing engineer who desires to have a broad knowledge of British practice." *A. M. Buck.*

*Electrical review (London)*, Aug. 31, 1917, p.205. 1½ col.

"Deals only with the technical considerations involved in the application of electric power to the working of tramways and railways, and is in the main a text-book for technical students...A valuable compendium alike for the student of electric traction engineering and for the engineer in practice, a text-book and hand-book in one." *H. M. S.*

*Times (London); engineering supplement*, June 29, 1917, p.139. 1¼ col.

"Is well got up and the text carefully revised. The illustrations are abundant and well supplied with footlines...Abounds in cross references, but the index is poor."

**Dover, A. T.**

Power wiring diagrams. 208 p. 1917. Whittaker, \$1.50 net.

*Canadian engineer*, Dec. 27, 1917, p.535. ½ col.

"The intention is to furnish engineers with actual connections of representative control apparatus in all ordinary industrial and power work, excepting electric traction...A specialist in any line will find the book too general for his benefit. Those who desire typical information in many lines will find it valuable." *H. W. Price.*

*Ironmonger*, Nov. 17, 1917, p.62. ½ col.

"Admirable diagrams...form a main feature of the book. Of these there are more than two hundred, and they cover both continuous and alternating current motors with all accessories, instruments and switch gear likely to occur in industrial work."

*Model engineer and electrician*, Dec. 13, 1917, p.373. 12 l.

"Handbook of connection diagrams of control and protective systems for industrial plants; it should be useful for reference by electricians and draughtsmen."

**Dudley, Emilius C. & Schocht, S. S. ed.**

Gynecology. 1917. Year Book Pub. Co., \$1.35. (Practical medicine series, v.4.)

*Saint Paul medical journal*, Dec. 1917, p.379. ¼ col.

"A review of the year's literature on gynecology. While it brings out very little that is new, it reveals a commendable effort to standardize treatment and to determine the end results of the many operations advised by gynecologists." *B. H. Ogden.*

**Dunkley, W. G.**

Design of machine elements. 2v. Van Nostrand, \$1.50 each. (Broadway series of engineering handbooks.)

*American machinist*, Nov. 29, 1917, p.966. ½ col.

"There is little that is new, or presented in a new way, as the material used is very similar to that in various other books on design of machine elements."

*Iron age*, Nov. 29, 1917, p.1334. ½ col.

*Power*, Dec. 4, 1917, p.781. ¼ col.

"In convenient form for ready reference."

**Durand, W. F.**

Practical marine engineering for marine engineers and students. Ed.4, rev. & enl. by C. W. Dyson. 982 p. 1917. Marine Engineering, \$6.

*Engineer*, Sept. 28, 1917, p.267. ¾ col.

"We feel sure that the time has arrived in America when it would be better to prepare an entirely new work than endeavour to support an old by new buttresses."

**Durham, Harry W.**

Saws; their care and treatment. 268p. Van Nostrand, \$2.50.

*American machinist*, Nov. 29, 1917, p.966. ½ col.

"Written in a clear, understandable way and the author covers his points without any undue verbosity."

*Machinery*, Nov. 1917, p.282. ¼ col.

"Written by one who has given the subject careful investigation for twenty-five years."

**Dutton, Walter Forest.**

Venesection; a brief summary of the practical value of venesection in disease. 1916. Davis, \$2.50 net.

*Saint Paul medical journal*, Oct. 1917, p.324. 7 l.

"Embodies all that is old and all that is new on venesection...The technique is described and indications set forth for its use...Instructive and well worth reading." *E. Paul Campbell*.

**Dyke, A. L.**

Automobile and gasoline engine encyclopedia. Ed.6, rewritten. 896 p. Author, St. Louis, \$3 net.

*Machinery*, Oct. 1917, p.186. 1-7 col.

"Presents in a clear, simple form the principles of gasoline engine and automobile construction and operation, and explains in detail what an operator should understand to operate or take care of any make of car."

**Dyson, C. W. See Durand, W. F.****Ekblaw, K. J. T.**

Farm concrete. 296 p. Macmillan, \$1.60.

*Industrial management*, Oct. 1917, p.157. ½ col.

"One of the most recent and certainly one of the best practical treatises on the use of concrete for every kind of farm structure to which this material can possibly be applied."

**Elements** of the theory and practice of cookery; a text-book of domestic science for use in schools. 405 p. 1916. Macmillan, \$1.

*American food journal*, Nov. 1917, p.635. ¼ col.

"Does not attempt to teach any particular method, but is intended to be equally useful to the single student and to the group."

**Ellinwood, F. O.**

Steam charts; also a table of theoretical jet velocities and the corrections of mercury columns, with fifty illustrative problems, Wiley, \$1.

*Power*, Nov. 6, 1917, p.645. ¼ col.

"Built around the charting of the physical properties of steam upon the total heat-specific volume plane."

**Ellms, Joseph W.**

Water purification. 445 p. 1917. McGraw, \$5 net.

*American journal of public health*, Nov. 1917, p.967. 1 col.

"Affords an excellently arranged text, while the engineer, desiring concrete information on the details of construction or the theories underlying the processes of water treatment, will find it exceedingly serviceable." *Earle B. Phelps*.

**Ensoll, Robert. See Bayley, Thomas.****Evans, William A.**

Preventive medicine. 380 p. 1916. Year Book Pub. Co., \$1.50. (Practical medicine series, 1916, v.7.)

*American journal of public health*, Sept. 1917, p.789. 1 col.

"A digest of utmost value, consisting of summaries of the more important activities and publications of the year...Readable, and rich in information." *W. T. Sedgwick*.



**Fales, Elisha Noel.**

Learning to fly in the U. S. army. 180 p. McGraw, \$1.50.

*Aviation*, Nov. 1, 1917, p.461. 11 l.

"Should be of greatest help to the aviator cadet for constant reference in the preliminary stages of his training."

*Machinery*, Nov. 1917, p.282. 12 l.

"A manual of aviation practice...well suited for the aeronautic instruction of the large number of men that have joined the flying corps since the declaration of war."

*Scientific American*, Dec. 15, 1917, p.468. ¼ col.

"Gives the gist of what the aviator must know, without sacrificing accuracy to brevity, and is admirably adapted for use as a text-book in the present emergency."

**Fales, Jane.**

Dressmaking. 508 p. 1917. Scribner, \$1.50.

*Journal of home economics*, Nov. 1917, p.529. 1 col.

"The broadest study of dressmaking must include the study of form, color, and materials, as well as the technique of garment making; these subjects are all treated more or less fully." *Charlotte G. Baker.*

**Fallon, John T.**

How to make concrete garden furniture and accessories. 105 p. McBride, \$1.50 net.

*Concrete*, Oct. 1917, p.126. ¼ col.

"Intended to be popular in its appeal."

**Farrar, Gilbert C.**

The typography of advertisements that pay. 282 p. Appleton, \$2.25 net.

*Printing art*, Sept. 1917, p.51. ½ col.

"The work will enable the 'typographical architect' to know his subject."

**Faught, Francis A.**

Faught's blood pressure. Ed.2. 280 p. Saunders.

*Pennsylvania medical journal*, Sept. 1917, p.850. 10 l.

"A practical treatise on this important subject for the general practitioner. The author has covered all the scientific and practical points in a clear and concise manner." *G. A. K.*

**Ferguson, J. A.**

Farm forestry. 241 p. 1916. Wiley, 6s. net.

*Nature*, Dec. 27, 1917, p.324. ½ col.

"A suitable text-book for agricultural students and for owners of small woodlands, as it covers in a simple way the whole subject of farm forestry...Consists of a series of readable chapters on the economic value of the wood-lot and on the principles of silviculture as applied to small woods."

**Fernald, Robert Heywood, & Orrok, G. A.**

Engineering of power plants. 586 p. 1916. McGraw, \$4.

*Sibley journal of engineering*, Sept. 1917, p.300. 1 col.

"Designed to introduce the student to the commercial aspects of engineering enterprises...A collection of notes, with numerous tables of data...for the installation and operation of power apparatus and auxiliaries...Illustrations are numerous and excellent." *C. H. B.*

**Ferry, E. S. and others.**

Practical pyrometry. 147 p. Wiley, \$1.50.

*Metallurgical and chemical engineering*, Jan 1, 1918, p.45. 12 l.

"An elaboration of notes compiled for a student laboratory course in Purdue University...The book is pretty good."

**Ficker, Nicholas Thiel.**

Shop expense analysis and control. 236 p. 1917. Eng. Mag., \$3.

*American machinist*, Oct. 11, 1917, p.658. 1¼ col.

"Contains much useful and helpful material, and the discussion raises many questions that require further investigation." *Dexter S. Kimball*.

*Industrial management*, Sept. 1917, p.949. ½ col.

"Should be helpful to anyone who has to deal with any phase of the analysis, study or control of shop expense."

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.819. 1 col.

"Treats almost entirely of the problems that center around manufacturing expense and its allocation." *Dexter S. Kimball*.

**Field, Clinton C.**

Retail buying. Harper, \$1.25 net.

*Journal of accountancy*, Oct. 1917, p.323. 1 p.

"A mine of information on the subject and at a most reasonable figure." *H. C. M.*

**Findlay, Alexander.**

Chemistry in the service of man. Ed.2. 272 p. 1917. Longmans, 6s. net.

*Nature*, Aug. 9, 1917, p.463. ½ col.

"Not many works on chemistry can be followed by lay readers, but this is one of the first rank."

*Science*, Oct. 12, 1917, p.364. 2½ col.

"Exceedingly readable, and...to be recommended, not only to the man who desires to get a glimpse of what modern chemistry is doing for the comfort and needs of life but quite as well to the first-year student of chemistry." *James Lewis Howe*.

**Fischer, Martin H. & Hooker, M. O.**

Fats and fatty degeneration. 1917. Wiley, \$2.

*Journal of industrial and engineering chemistry*, Dec. 1917, p.1156. ¾ col.

"Suffers from the double defect that the underlying conception is wrong and that it is impossible to tell from the text just what the author has worked out for himself and what he has appropriated." *Wilder D. Bancroft*.

**Fish, Ada Z.**

American Red Cross text book on home dietetics. 118 p. 1917. Blakiston, \$.75.

*Journal of home economics*, Oct. 1917, p.483. 1 col.

"After reading this book we are a little at a loss to understand just what is the field that 'Home Dietetics' is intended to cover." *Louise Stanley*.

**Fleming, A. P. M. & Pearce, J. G.**

Principles of apprentice training, with special reference to the engineering industry. Longmans, 3s. 6d. net.

*Engineering*, July 20, 1917, p.71. 3 col.

"As a definite, constructive effort at a workable solution to a problem of the first importance in the industrial and social life of the near future the volume is deserving of the highest commendation."

**Fluhrer, William F.**

An inquiry into the principles of treatment of broken limbs. 128 p. Rebman, \$3 net.

*Scientific American*, Nov. 17, 1917, p.375. ½ col.

**Flying book.** Ed.2. Longmans, 3s. 6d. net.

*Engineer*, Aug. 10, 1917, p.118. ¼ col.

"First edition...was published in 1914. It was evidently the intention that it should be revised yearly, but owing to the war it has been found impossible to produce the second edition till the present time."

**Folwell, Amory Prescott.**

Water supply engineering; the designing and constructing of water-supply systems. Ed.3, rewritten. 484 p. 1917. Wiley, \$3.50 net.

*Canadian engineer*, Nov. 29, 1917, p.462. 1¼ col.

"Divided into sixteen chapters which deal with quantity, quality, and purification of water, source, rainfall, surface water, rivers and lakes, ground water, gravity schemes, pumping systems, pumps, dams, designing, etc., etc." *R. O. Wynne-Roberts*.

*Municipal journal*, Nov. 1, 1917, p.438. ¾ col.

"Differs quite materially from the first two editions."

**Foote, Charles E.**

Practical road building. 295 p. McKay, \$1.25 net.

*Canadian engineer*, Nov. 29, 1917, p.461. ½ col.

"Just a book on roads, written by a practical observer, and for popular consumption." *W. A. McLean*.

*Concrete*, Oct. 1917, p.126. ¼ col.

"Rather popular and promotional in treatment and apparently intended to serve an excellent purpose in satisfying a demand from the many people interested in the national movement for good roads."

*Scientific American*, Nov. 3, 1917, p.340. ¼ col.

"Supplies...the essentials of good road construction and maintenance...Information is exact and readily understandable."

**Foote, John, ed.**

State board questions and answers for nurses; being the actual questions submitted at the examinations of 31 state examining boards for nurses. Lippincott, \$2.50.

*American journal of nursing*, Sept. 1917, p.1243. ½ p.

"Is the only book of the kind, and it will undoubtedly be of great help to those preparing for examinations, either as an examiner or as one to be examined. It is very complete and contains a valuable store of information."

**Fort, M. & Lloyd, L. L.**

Chemistry of dyestuffs; a manual for students of chemistry and dyeing. 311 p. 1917. Cambridge University Press, 7s. 6d. net. (Cambridge technical series.)

*Nature*, Sept. 13, 1917, p.22. 1½ col.

"A useful addition to the rapidly increasing number of manuals in the English language devoted to the subject of dyes and their intermediate products...An efficient guide to one of the most complicated and technical branches of applied chemistry." *G. T. Morgan*.

**Fowler, G. Herbert.**

Charts; their use and meaning. 47 p. 1916. J. D. Potter, 4s.

*Nature*, Aug. 9, 1917, p.461. 1 p.

"Without a knowledge of mathematical instruments it is useless to study this work."

**France—Bureau des longitudes.**

Annuaire pour l'an 1917. 664 p. 1917. Gauthier-Villars, Paris, 2 fr.

*Bulletin of the American Mathematical Society*, Dec. 1917, p.157. ¾ p.

**Franke, G.**

Handbook of briquetting; tr. by F. C. A. H. Lantsberry. 2v. v.1: Briquetting of coals, brown coals and other fuels. 631 p. Griffin, 30 s. net.

*Times (London)*; *engineering supplement*, July 27, 1917, p.159. 1¾ col.

"Constitutes the first of two volumes forming a translation of an elaborate work on briquetting...Primarily intended as a handbook for those actively engaged in or connected with the industry in any of its technical or commercial aspects...Also intended as a text-book in schools of mining and metallurgy and technical high schools."



**Franklin, William Suddards.**

Treatise on the elements of electrical engineering. v.1: Direct and alternating-current machines and systems. 465 p. Macmillan, \$4.50.

*Electric Journal*, Dec. 1917, adv. sec. p.38. ½ col.

"Textbook for technical schools and colleges."

*Electrical review (Chicago)*, Dec. 22, 1917, p.1074. ¾ col.

"Offered as a new Vol. 1 of the series on 'The Elements of Electrical Engineering' ... While the high classroom value of the work is already guaranteed by Professor Franklin's own use of the same, it also deserves particular consideration because of its extensive recognition of modern practice and because of the clarity which should make it a textbook worth preserving for later reference." *Albert Scheible*.

*Scientific American*, Nov. 17, 1917, p.374. ¾ col.

"Reviews and surveys elementary and applied electricity and magnetism and presents direct-current machines and systems."

**Friend, J. Newton, ed.**

Textbook of inorganic chemistry. v.4: Aluminum and its congeners, including the rare earth metals, by H. F. V. Little. 455 p. Lippincott, \$5.

*Mining American*, Dec. 29, 1917, p.14. ½ col.

"This remarkable textbook is a set of nine volumes, an entire volume being devoted to the consideration of the elements in each of the nine vertical columns of the Periodic Classification... It is a thorough study of the chemistry of the elements in the third group... Very complete... With the aid of the most comprehensive bibliography given throughout, almost exhaustive information about any one topic may be found."

**Fron, J.**

Plantes nuisibles à l'agriculture. 346 p. 1917. J. B. Baillière, Paris, 5 fr.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.152. ¾ p.

**Fürth, Otto von.**

Problems of physiological and pathological chemistry of metabolism for students, physicians, biologists and chemists; tr. by A. J. Smith. 667 p. Lippincott, 25s. net.

*Science progress*, Oct. 1917, p.350. ½ p.

"A translation of the second volume of v. Fürth's *Probleme der Physiologischen und Pathologischen Chemie*... Translation is fluent and readable... May be commended heartily to advanced students, to experimenters, and to those engaged in human and in veterinary medical practice." *W. L. S.*

**Gage, Simon Henry.**

The microscope; an introduction to microscopic methods and to histology. Ed.12. 472 p. 1917. Comstock Publishing Co., Ithaca, \$3.

*Scientific American*, Dec. 29, 1917, p.504. ¾ col.

"The great progress of microscopy in the last decade has been embodied in the twelfth edition of this meritorious work."

*Transactions of the American Microscopical Society*, Oct. 1917, p.283. ½ p.

"This edition... differs from previous ones chiefly in the omission of matter pertaining to micro-chemistry and metallography, and in the up-to-date treatment of those elaborations of processes and apparatus that have taken place during the last ten years."

**Gager, C. S.**

Fundamentals of botany. Blakiston.

*Science*, Dec. 21, 1917, p.617. 2 col.

"Should be in the hands of every teacher of botanical science, and by its broadness and balance is admirably adapted for use in schools where the one-sided teaching of the facts of botany is by necessity and common sense excluded." *E. C. Jeffrey*.

**Gardner, Henry A.**

Paint researches and their practical application. 384 p. 1917. Author, Washington, \$5.

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820. ½ col.  
"The author summarizes the investigations which he conducted at the Institute of Industrial Research for the Educational Bureau of the Paint Manufacturers' Association of the United States."

**Garrard, C. C.**

Electric switch and controlling gear. 656 p. Electrician, 15s. net.

*Nature*, March 1, 1917, p.2. 1¼ col.  
"As a work of reference, this book is of value. Much of the information in it is novel, and the problems discussed are those which are exercising the minds of electrical engineers at the present time." *A. Russell.*

**Gaster, Léon, & Dow, J. S.**

Modern illuminants and illuminating engineering. 462 p. Whittaker.

*Revue générale de l'électricité*, Aug. 25, 1917, p.284. 1¾ col.

**Geerligs, H. C. Prinsen.**

Chemical control in cane sugar factories. Van Nostrand.

*Metallurgical and chemical engineering*, Oct. 15, 1917, p.503. 1 col.  
"Revision of a book with a similar title published in 1905...Intended as a guide and working manual for the 'European chemist' who goes to the tropics to take charge of the laboratory of a cane sugar factory with no trained help except that of his native assistants...Copiously provided with tables...should be of value to every cane sugar chemist."

**Geller, Carl. See Cotton facts.****Gibb, David.**

Course in interpolation and numerical integration for the mathematical laboratory. 90 p. G. Bell, 3s. 6d. net. (Edinburgh mathematical tracts, no. 2.)

*Knowledge*, Oct.-Dec. 1917, p.40. ½ col.  
"The importance of the branch of mathematics with which this volume...deals is out of proportion to the comparatively small numbers of works dealing with it. The book, therefore, is especially welcome." *H. S. Redgrove.*

**Gilbreth, Frank, & Gilbreth L. M.**

Applied motion study. 220 p. Sturgis & Walton, \$1.50.

*Electrical review (Chicago)*, Dec. 15, 1917, p.1034. ½ col.  
"Presents in outline: (1) The field where motion study has been and can be applied. (2) The methods by which it is applied. (3) The effects of the application."

**Gillette, Halbert P.**

Clearing and grubbing. Clark Bk. Co., Inc., \$2.50.

*American forestry*, Nov. 1917, p.695. ½ col.  
"The only book of its kind in print...Mr. Gillette...has clearly and thoroughly covered the various methods and machinery employed, and embodied wherever possible most valuable cost figures...The merit of the book, and its value, are unquestioned."

**Gina, Michele, & Gina-Lollini, Clara.**

Combinazioni chimichi fra metalli. 446 p. 1917. Hoepli, Milan, 12.50 lire.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.157. ¼ p.  
*Chemical news*, Oct. 5, 1917, p.173. ¼ col.  
"A very concise account of the compounds of metals among themselves."

**Glasgow University.**

Papers from the geological department, Glasgow University, v.3, 1916. 1917. Maclehose, Glasgow.

*Nature*, Oct. 11, 1917, p.103. ½ col.  
"Records once more the activity of the geological school in the University of Glasgow." *G. A. J. C.*

**Glazebrook, Richard T.**

Science and industry; the place of Cambridge in any scheme for their combination. 51 p. 1917. Cambridge University Press, 1s. 6d. net.

*Chemical news*, Sept. 21, 1917, p.149.  $\frac{3}{8}$  col.

"There is much food for reflection in this little book, which contains the Rede Lecture for 1917, and it is to be hoped that it will be widely circulated among the educated public."

*Ironmonger*, Sept. 1, 1917, p.45.  $\frac{1}{2}$  col.

"The remarkable work done by trained scientific men since the outbreak of the war was the theme of the earlier part of the lecture."

**Gledhill, Arthur H.**

Practical costing. 72 p. Gledhill-Brook Time Recorders Ltd., London, 3s. net.

*Electrical review (London)*, Sept. 21, 1917, p.275.  $1\frac{1}{2}$  col.

"Deals with the subject in a thoroughly comprehensive manner, and covers the ground from 'Alpha to Omega'...The reviewer can recommend this book to all those interested in manufacturing costs." J. C. P.

*Ironmonger*, Sept. 1, 1917, p.45.  $\frac{1}{2}$  col.

"Following a careful introduction to the problem and its difficulties, considerable space is devoted to a description of card costing...the effect of lost minutes, of wasted time and material, and of overtime on production."

*Times (London)*; *engineering supplement*, Oct. 26, 1917, p.219.  $\frac{3}{4}$  col.

"It is, so to speak, written round the methods that are based on time-clocks...It is the more desirable to class Mr. Gledhill's book as an enlightened and helpful advertisement, because the interest of industry demands that such advertisements should be far more frequent than they are."

**Godard, André.**

Les oiseaux nécessaires à l'agriculture, à la sylviculture, à la viticulture, à l'arboriculture et à l'hygiène publique. 121 p. 1917. Perrin, Paris, 1 fr. 50.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.159.  $\frac{1}{2}$  p.

**Goddard, R. E.**

General cargo; an introduction to salesmanship. 199 p. Constable, 4s. 6d. net.

*Electrician*, Nov. 2, 1917, p.158.  $\frac{1}{2}$  col.

"A purely commercial volume, the contents of which are not obvious from the main title. Is concerned with salesmanship."

**Goudie, William J.**

Steam turbines. 519 p. 1917. Longmans, \$4.

*Journal of the American Society of Mechanical Engineers*, Nov. 1917, p.975. 2 col.

"Primarily designed for the use of engineering students, but...will be of considerable use to designing engineers...Covers the field about as completely as any turbine book which has been published up to the present time, and should be a very valuable addition to any engineer's library." R. J. S. Pigott.

**Gourdon, C.**

Notions pratiques d'électricité; applications au matériel d'aviation. 139 p. Dunod & Pinat, Paris, 4 fr. 95.

*Le Génie civil*, Oct. 6, 1917, p.236.  $\frac{1}{3}$  col.

*Revue générale des sciences pures et appliquées*, Oct. 31, 1917, p.587.  $\frac{1}{3}$  col.

**Goursat, Édouard.**

Course in mathematical analysis; tr. by E. R. Hedrick and O. Dunkel. 2v. Ginn.

v.1. 548 p. 16s.

v.2, pt.1. Functions of a complex variable. 260 p. 11s. 6d.

*Science progress*, July 1917, p.158. 1 p.

"An excellent translation of one of the best of the French treatises on analysis... The first volume...was apparently published in 1904, although the title-page bears no



**Goursat, Édouard**—*continued*.

date. The first part of the second volume is translated from the first half of the second volume of the second edition of Goursat's work, and was published in 1916. The first volume was not radically altered in the second French edition, so that the present English translation of that volume may be used conveniently as a companion to that of the second volume." *Philip E. B. Jourdain*.

**Grahame-White, Claude, & Harper, H.**

Air-power; naval, military, commercial. 262 p. 1917. Chapman & H., 7s. 6d. net.

*Nature*, Aug. 16, 1917, p.481. 1¼ col.

"A non-technical survey of the position of aviation and its future...Raises political as well as technical issues."

**Grant, John W.**

Watt and the steam age. 212 p. St. Bride's P., 7s. 6d. net.

*Model engineer and electrician*, Oct. 4, 1917, p.221. 1 col.

"There are several inaccuracies and evident mistakes, but the printing is clear and the book as a whole very readable...Should have quite an educational value to apprentices, mechanics, and amateur engineers."

*Practical engineer*, Oct. 11, 1917, p.177. 7 l.

"Interesting popular account of James Watt and his great work on the reciprocating and locomotive engines."

**Graves, Lulu Grace.**

Modern dietetics; feeding the sick in hospital and home, with some studies on feeding well people. Modern Hospital Pub. Co., \$2.

*American journal of nursing*, Nov. 1917, p.173. ½ p.

"Practical in the strictest sense...Subject is scientifically treated and yet is written in 'the language of the intelligent nonprofessional reader.'"

**Graveson, W.**

British wild flowers; their haunts and associations. 320 p. Headley, 7s. 6d. net.

*Nature*, Aug. 23, 1917, p.501. ½ col.

"Mr. Graveson writes for the general reader...His style is discursive, but contains some information on the life-history of the commoner wild plants. There is a good deal of 'folk-lore' derived from well-known sources, and also plenty of quotations from the poets."

**Gray, Alexander.**

Principles and practice of electrical engineering. Ed.2. 432 p. McGraw, \$3.

*Electrical world*, Sept. 15, 1917, p.535. ¾ col.

"Contains a very large amount of well selected and generally accurate information covering an unusually wide range of matters."

**Gray, R. H.**

Railway connections and junction points. 341 p. Camman, \$1.50.

*Railway age gazette*, Nov. 2, 1917, p.783. ½ col.

**Green, C. E.**

The cancer problem; a statistical study. 140 p. 1917. W. Green.

*Nature*, Oct. 25, 1917, p.143. ¾ col.

"Illustrated with maps and diagrams and is very readable and interesting." *R. T. Hewlett*.

**Greene, A. M.**

Elements of refrigeration. 472 p. Chapman & H., 18s. 6d.

*Engineering review*, Nov. 15, 1917, p.143. 1 col.

"Contains in convenient form all the data required to design, construct, and operate refrigeration plant—a thoroughness carried right through to the provision of pipe threads and similar tables." *R. E. Neale*.

**Grew, E. S.**

Marvels of geology. 244 p. 1918(?) Lippincott, \$1.25 net.

*Scientific American*, Nov. 17, 1917, p.374.  $\frac{3}{8}$  col.

"The contents...are drawn from the author's more elaborate work, 'The Romance of Modern Geology,' and they form a very good selective treatment of earthbuilding processes, the effects of weather on the earth's history, records left by rivers and the sea, life in other worlds, rocks, earthquakes, coal beds, and prehistoric animal life, the whole told in nontechnical language."

**Grey, C. G. ed. & comp.**

All the world's aircraft, 1917. Low, £1, 1s.

*Aeronautics*, Nov. 7, 1917, p.356.  $2\frac{1}{2}$  col.

"New features that have been introduced are the segregation of the airships of all nations into a section separate from the aeroplanes, and the provision of an aeronautical dictionary." *W. L. M.*

Omissions, inaccuracies and poor arrangement in certain portions are noted.

*Engineer*, Aug. 24, 1917, p.166.  $\frac{7}{8}$  col.

"Under Mr. Grey's expert editorship the interest and value of the book have been considerably enhanced. A new feature is an aeronautical dictionary of technical and slang terms."

*Engineering*, Aug. 10, 1917, p.156.  $1\frac{1}{2}$  col.

"There are several interesting additions made in the year's volume."

**Grialou, J.**

Cours d'hydraulique. 550 p. 1916. Gauthier-Villars, Paris, 20 fr.

*Revue générale des sciences pures et appliquées*, July 31, 1917, 443. 2 col.

**Grunsky, Carl Ewald, & Grunsky, C. E. jr.**

Valuation, depreciation and the rate-base. 387 p. 1917. Wiley, \$4 net.

*Canadian engineer*, Oct. 25, 1917, p.368.  $1\frac{3}{4}$  col.

"Particularly useful as a reference book for engineers and economists...The tables alone will be found indispensable in most engineers' offices." *H. V. Coes.*

**Guppy, H. B.**

Plants, seeds, and currents in the West Indies and Azores; the results of investigation carried out in those regions between 1906 and 1914. 531 p. 1917. Williams & N., 25s. net.

*Nature*, Nov. 1, 1917, p.162.  $1\frac{1}{2}$  col.

"Deals...with the numerous problems connected with plant distribution in the Atlantic region and embodies results of great scientific interest." *D. M.*

*Science progress*, July 1917, p.171. 1 p.

"Mr. Guppy takes the opportunity of supporting the view that the ultimate basis of Evolution is geographical environment. He regards the cosmopolitan families and genera as the more primitive, characterised by an absence of specialisation that enables them to occupy a wide range." *E. J. Salisbury.*

**Haldane, J. S.**

Organism and environment as illustrated by the physiology of breathing. 138 p. 1917. Yale University Press, 5s. 6d. net.

*Nature*, Nov. 29, 1917, p.241.  $2\frac{1}{2}$  col.

**Hale, William J.**

Laboratory manual of general chemistry. 474 p. 1917. Macmillan.

*American journal of science*, Nov. 1917, p.399.  $\frac{1}{2}$  p.

"Presents an unusually extensive and advanced course of laboratory work." *H. L. W.*

**Halliburton, W. D.**

Essentials of chemical physiology for the use of students. Ed.9. 324 p. 1916. Longmans, 6s. net.

*Science progress*, July 1917, p.180.  $\frac{3}{4}$  p.

"Author combines the faculty of making the complex appear simple with that of discriminating, with accuracy, between the more and the less essential." *W. L. Symes.*

**Halliburton, W. D.**

Handbook of physiology. Ed.13. (Ed.26 of Kirke's Physiology.)  
930 p. Murray, 16s. net.

*Knowledge*, Jan.-Sept. 1917, p.20.  $\frac{1}{4}$  col.

"Well printed on good paper, and there is a copious index. We are still of the opinion that this volume is the best general text-book of Physiology in the English language." *S. H.*

**Hamilton, H.**

Scientific treatise on smoke abatement. 155 p. 1917. Sherratt & H.,  
5s. net.

*Chemical news*, Oct. 19, 1917, p.197.  $\frac{1}{4}$  col.

"Intended for the use of students who are hoping to take the examination of the Royal Sanitary Institute, and also for practical men, engineers, manufacturers, &c... The law relating to smoke production is outlined, and a very brief account is given of the application of gas, oil, and electricity for heating."

*Ironmonger*, Oct. 6, 1917, p.43.  $\frac{1}{2}$  col.

"Well-constructed treatise on the bigger question of the economical consumption of coal in industrial processes."

*Nature*, Sept. 13, 1917, p.23.  $\frac{3}{4}$  col.

"Author is clearly more familiar with the subject of mechanical engineering than with either physics or chemistry." *J. B. C.*

*Practical engineer*, Aug. 30, 1917, p.103.  $\frac{3}{4}$  col.

"Approaches his subject mainly from the point of view of the sanitarian and smoke inspector... Tells us about the chemical constituents of fuels and of smoke, and how to judge as to the volume, colour, and density of smoke... Also concerned with legal aspect of the question."

*Times (London); engineering supplement*, Aug. 31, 1917, p.179.  $\frac{4}{5}$  col.

"Compiled by the author to fill what he considers to be a gap in the literature of the subject. Whether a hand-book specially written for students studying for the examinations of the Royal Sanitary Institute was needed is doubtful, in view of the fact that several well-written books dealing with the problem of smoke abatement... are already included in the lists of the leading scientific publishers... If a second edition... should be called for it would be well... to rewrite chapter VI., on domestic fire-grates... and to add an index... The literary style... might also be greatly improved."

**Hancock, Harris.**

Elliptic integrals. 104 p. 1917. Wiley, \$1.25 net. (Mathematical  
monographs, no.18.)

*Canadian engineer*, Nov. 29, 1917, p.462.  $\frac{1}{2}$  col.

"Should appeal to the student of engineering, and to the engineer who needs to employ these integrals." *Alfred T. De Lury.*

*Nature*, Dec. 27, 1917, p.324.  $\frac{1}{2}$  col.

"A very useful monograph, compact, well arranged, and apparently accurate."  
*G. B. M.*

*Science progress*, Oct. 1917, p.343.  $\frac{2}{3}$  col.

"This volume is the eighteenth of the excellent series of 'Mathematical Monographs' edited by Mansfield Merriman and Robert S. Woodward... Of value to those students who have a taste for the rather complicated technical work of calculation involved in this 'higher trigonometry.'" *Philip E. B. Jourdain.*

**Harding, Louis Allen, & Willard, A. C.**

Mechanical equipment of buildings. v.2: Power plants and refrigeration.  
766 p. 1917. Wiley, \$5 net.

*Journal of the American Society of Mechanical Engineers*, Nov. 1917, p.976.  $1\frac{1}{2}$  col.

"An almost ideal book for the mechanical engineer for use as reference... The information contained is... well assembled and indexed... To the designing engineer the book is almost indispensable. To the power-plant engineer it is also of great value, and the refrigerating engineer, even if the refrigeration section is somewhat limited, will find that the remainder of the contents on steam-power plant proper is well adapted to his uses." *Victor J. Azbe.*

*National engineer*, Nov. 1917, p.514.  $1\frac{1}{2}$  col.

"Second volume of a series of three on the Mechanical Equipment of Buildings... Practically every detail connected with the theory, design, construction, cost and operating efficiency of power and refrigerating machinery has been covered in this book, in the light of the most advanced practice."



**Harding, S. T.**

Operation and maintenance of irrigation systems. 271 p. 1917. McGraw, \$2.50.

*Canadian engineer*, Sept. 27, 1917, p.284. ½ col.

"A valuable addition to the library of any one interested in the general question of operation and maintenance of irrigation systems...Not technical and only attempts to cover the problems met with on such work in the United States and to a limited degree in Canada." *A. S. Dawson*.

*Engineering news-record*, Nov. 15, 1917, p.938. 1½ col.

"Excellent compilation of the fundamental principles and representative methods of the operation and maintenance of irrigation systems in the United States." *Andrew Weiss*.

**Harris, Elmo G.**

Compressed air; theory and computations. Ed.2, rev. & enl. 192 p. McGraw, \$2.

*Engineering and mining journal*, Sept. 15, 1917, p.472. ⅓ col.

"For the student mathematically inclined there are many problems to be solved... Novelty is claimed for a number of the tables appended, but in each there is something or other which has not been taken into consideration, 'causing a slight error.'"

**Hausbrand, E.**

Evaporating, condensing and cooling apparatus; tr. from 2d. rev. German ed. by A. C. Wright. 2d. English ed. 401 p. Scott, Greenwood, \$5 net.

*Metallurgical and chemical engineering*, Nov. 15, 1917, p.612. ⅓ col.

"On the basic laws of physics and is largely mathematical."

**Havens, Verne Leroy.**

Ingenieria de ferrocarriles. 357 p. Wiley, \$3.50.

*Engineering news-record*, Dec. 20, 1917, p.1168. 1½ col.

**Hawkins** electrical guide. 10v. 1917. Audel, \$10.

*Ironmonger*, Oct. 6, 1917, p.43. ¼ col.

"One of the most popular works on the subject indicated that have appeared in the United States."

**Heath, George L.**

Analysis of copper. 292 p. McGraw, \$3.

*Metallurgical and chemical engineering*, Nov. 15, 1917, p.612. ½ col.

"Very acceptably fills its place among others for use in industrial laboratories. The methods given are those of which industrial practice has fully demonstrated the merit."

**Heath, T. E. comp.**

Distances, absolute magnitudes and spectra of 734 stars; arranged for use with ordinary star maps. 52 p. Sold by Miss Crealock, South Cliff St., Tenby [England], 2s. 6d. net.

*Nature*, Nov. 22, 1917, p.223. ⅞ col.

**Hedrick, U. P. and others.**

Peaches of New York. 1917. New York Agricultural Experiment Station, Geneva.

*Science*, Nov. 2, 1917, p.439. 1¾ col.

"Surpasses [Poiteau's 'Pomologie Française']...in two fundamental particulars, in the excellence of its plates and in the scientific assemblage of taxonomic data...It is not too much to say that, in breadth of view, bibliographic comprehensiveness, and critical examination of detail it would be hard to find better work anywhere in the older fields of taxonomic science." *F. A. W.*

**Heil, Adolf, & Esch, W.**

Manufacture of rubber goods; tr. by Edward W. Lewis. 236 p. Lippincott, \$4.

*India rubber world*, Sept. 1917, p.727. ¼ col.

"A useful addition to the library of every rubber man of the younger generation."

**Heldt, Peter Martin.**

Gasoline automobile; its design and construction. 2v. Author, Nyack, N. Y.

v.1. The gasoline motor. Ed.4, rewritten. 603 p. \$4.

v.2. Transmission, running gear and control. Ed.2. 560 p. \$5.

*Gas engine*, Nov. 1917, p.551, (review of v.2). 1 col.

"The treatment of every part of the car is illustrated with a generous number of examples of existing types of the various elements or assemblage of elements under discussion. . . A book that every student of the motor car should have."

*Sibley journal of engineering*, Nov. 1917, adv. sec. p.26, (review of v.1). ¼ col.

"Among the new matter added is a chapter on water cooling, and one relating to the mechanics of the various types of cams which are thoroughly treated with regard to both theory and practice."

**Henderson, John B.**

Cruise of the Tomas Barrera. 320 p. 1916. Putnam, 12s. 6d. net.

*Science progress*, July 1917, p.176. ¾ p.

"Scope. . . is well indicated in its sub-title, 'The Narrative of a Scientific Expedition to Western Cuba and the Colorados Reefs, with Observations on the Geology, Fauna, and Flora of the Region.' It is a well-written and throughout interesting account of a six weeks' collecting trip." *C. H. O'D.*

**Henderson, Lawrence J.**

The order of nature. 1917. Harvard Univ. Press.

*Science progress*, Oct. 1917, p.342. ½ p.

"An essay by the Assistant Professor of Biological Chemistry in Harvard University, on the subject of Teleology. . . Although his analysis is worthy of careful study, we do not think its result can be considered satisfactory. . . By a conscious resort to vagueness, the problem is not solved but merely shelved." *Hugh Elliot.*

**Hendrick, Ellwood.**

Everyman's chemistry; the chemist's point of view and his recent work, told for the layman. 373 p. 1917. Harper; \$2 net. (Harper's modern science series.)

*American journal of pharmacy*, Dec. 1917, p.621. 1½ p.

"Style is clever and appealing. . . Book is one from which every reader, whether he be chemist or layman, should draw pleasure and profit." *C. H. Law.*

*Chemical engineer*, Dec. 1917, p.49. 1½ col.

"Well balanced, carefully arranged and eminently adapted to meet the needs of a multitude of busy people, desirous of gaining an intelligent acquaintance with the mass of chemical phenomena in the midst of which our life is passed. . . He has succeeded admirably in producing a scientific manual which is brimful of human interest."

*Druggists circular*, Jan. 1918, p.41. ½ col.

"Has more the appearance and feel of a popular novel than a text book."

*Gas age*, Nov. 15, 1917, p.446. ¼ col.

"Essentially elementary in its character and is supplemented by an excellent bibliography."

*Machinery*, Nov. 1917, p.282. 15 l.

*Metal industry*, Nov. 1917, p.491. ½ col.

"To those who wish they knew something about chemistry, this book opens the door. It does not profess to be a complete treatise and is in no sense a laboratory guide. On the other hand, it does contain. . . much chemical information."

*Metallurgical and chemical engineering*, Jan. 1, 1918, p.46. ¾ col.

"The wide distribution of the book will make for an enlightened public intelligence on the great chemical industry which is bound to grow in importance in this country."

*Oil, paint and drug reporter*, Dec. 10, 1917, p.20. ¼ col.

"To the man of intelligence who would realize what chemistry has done and is doing, particularly since the developments incident to the world war, this book will prove a *multum in parvo*."

*Power*, Dec. 4, 1917, p.781. ½ col.

"Tells how chemists think and how their work enters into life and industry on every hand and gives the reader a true chemical view of things."

**Hendricks'** commercial register of the United States for buyers and sellers. Ed.26. 2228 p. 1917. Hendricks, \$10 net.

*Building age*, Nov. 1917, p.640.  $\frac{3}{4}$  col.

"Standard publication devoted especially to the interests of the architectural, building, contracting, electrical, engineering, hardware, iron, mechanical, quarrying, mill, mining, railroad, steel and kindred industries."

*Foundry*, Dec. 1917, p.547.  $\frac{1}{2}$  col.

"Full lists are included of producers, manufacturers, dealers and consumers. All products, from the raw material to the finished article also are listed."

*India rubber world*, Dec. 1917, p.159.  $\frac{1}{2}$  col.

*Iron age*, Nov. 15, 1917, p.1226a.  $\frac{1}{2}$  col.

*Iron trade review*, Dec. 27, 1917, p.1388.  $\frac{1}{2}$  col.

"Revised, corrected and brought up to date... An alphabetical section containing in one a list of the name, trade, description and address of every concern appearing in the book is published for the first time in this edition."

*Machinery*, Nov. 1917, p.282.  $\frac{1}{2}$  col.

"Indispensable to concerns who would compile their own mailing lists."

*Metal industry*, Nov. 1917, p.491.  $\frac{1}{2}$  col.

*Scientific American*, Nov. 17, 1917, p.374.  $\frac{1}{2}$  col.

"The amplitude of its offering leaves little to be desired, and anyone interested either as buyer or seller, in any kind of building construction and equipment, or in railroad, mining, or engineering materials, will find that this widely used directory gives ready access to the sources of supply and demand."

**Henry, Frank S.**

Printing; a text-book for printers' apprentices, continuation classes, and for general use in schools. 318 p. Wiley.

*Printing art*, Dec. 1917, p.265.  $\frac{1}{2}$  col.

"Up-to-date in covering the field, its text including information regarding the latest composing, cutting and mitering machines."

**Hering, Carl, & Getman, F. H.**

Standard table of electrochemical equivalents and their derivatives. 130 p. 1917. Van Nostrand, \$2 net.

*American journal of science*, Nov. 1917, p.399.  $\frac{1}{2}$  p.

"Appears to be... very useful... not only for the purposes of practical electro-chemical calculations, but also as a reliable and concise source of theoretical information in the field where chemical and electrical sciences are connected." *H. L. W.*

*Electric journal*, Nov. 1917, adv. sec. p.38. 12 l.

"A reference work of tables, although sufficient explanatory text has been included so that the data may be used without referring to other treatises."

*Electrical review (Chicago)*, Dec. 15, 1917, p.1034.  $\frac{3}{4}$  col.

"Will prove of great value to electrochemists and others concerned with electrolysis problems." *M. G. Lloyd.*

*Scientific American*, Dec. 22, 1917, p.488.  $\frac{1}{2}$  col.

"A table of constants based upon the latest fundamental values is offered... by means of which the investigator may determine the amounts of substances deposited, dissolved, or otherwise chemically changed by an electric current... A second division summarizes the physical conception of electrochemical phenomena, and treats briefly of electrolysis as based upon the dissociation theory."

**Hesler, Lexemuel Ray, & Whetzel, H. H.**

Manual of fruit diseases. 462 p. 1917. Macmillan, \$2.

*Botanical gazette*, Sept. 1917, p.254.  $\frac{1}{2}$  p.

"Discusses the subject from an essentially New England viewpoint, omitting from all consideration fruits and diseases that are of major interest in many states and nearly all that are of interest in our tropical possessions... A valuable addition to the literature of plant diseases."

**Hewes, Amy, & Walter, H. R.**

Munition makers. 158 p. Russell Sage Foundation, \$.75 net.

*American machinist*, Oct. 18, 1917, p.702.  $\frac{1}{2}$  col.

"Those who are interested in the general welfare of industry, after the war as well as at present, will do well to study some of the points brought out by these writers."



**Higbee, F. G.**

Essentials of descriptive geometry. Ed.2. 218 p. Wiley, \$1.80 net.

*Canadian engineer*, Dec. 27, 1917, p.536.  $\frac{1}{2}$  col.

"Should be very valuable to the student in engineering and the draftsman, as it points out the way to the application of the subject to the requirements of engineering practice." *W. J. Smither*.

*Machinery*, Nov. 1917, p.282. 15 l.

**Hill, A.**

Food. 64 p. 1917. S. P. C. K., 9d. (Manuals of health, no. 1.)

*Nature*, Aug. 23, 1917, p.503.  $\frac{2}{3}$  col.

**Hill, Lewis Webb, & Eckman, R. S.**

Starvation treatment of diabetes, with a series of graduated diets. Ed.3. 1917. Leonard, \$1.

*American journal of nursing*, Sept. 1917, p.1242.  $\frac{1}{2}$  p.

"The names of many diabetic foods are familiar to nurses. These foods have been analyzed at the Connecticut Agricultural Experiment Station, and many of them have been proved to be undesirable for patients with diabetes. These analyses are given in this book."

**Hill, Ralph W.**

Machine drawing. 92 p. McGraw, \$1.

*American machinist*, Sept. 6, 1917, p.438.  $\frac{1}{2}$  col.

"The contents and logical sequence in presenting and familiarizing the young student with the proper methods of making shop drawings are well conceived."

*Mining and scientific press*, Dec. 29, 1917, p.948. 7 l.

"Covers the essentials of machine-design in its more simple aspects, and gives practical instruction in draughting and in the production of acceptable high-grade drawings and tracings."

**Hillebrand, W. F.**

Our analytical chemistry and its future. 36 p. 1917. Columbia University Press, 1s. 6d. net.

*Nature*, Oct. 18, 1917, p.125.  $\frac{1}{2}$  col.

"A national institution of analytical chemistry is wanted, of high scientific authority and in touch with industry: the best conditions for establishing and maintaining such an institution are discussed by Dr. Hillebrand at some length." C. S.

**Hirschberg, Charles A.**

Compressed air for the metal worker. 315 p. Clark Bk. Co. Inc., \$3.

*American machinist*, Sept. 6, 1917, p.438.  $\frac{1}{4}$  col.

"Brings together in one volume considerable material which heretofore has only been available in the form of a number of manufacturers' catalogs."

*Iron age*, Oct. 11, 1917, p.909.  $\frac{5}{8}$  col.

"Opens with a chapter on the history of compressed air... Then follows a chapter giving a glossary of compressed air terms. Following this are three chapters devoted to pneumatic tools, their care, and operation and their varied applications... Is concluded with chapters on the use of compressed air for the application of paint, lacquer, etc., and the use of compressed air for pumping purposes." E. C. R.

*Power*, Oct. 30, 1917, p.613.  $\frac{1}{4}$  col.

"A compilation of useful nontechnical information on current practice in compressed-air machinery, and the applications of compressed air."

**Holt, Andrew H.**

Manual of field astronomy. 128 p. 1917. Wiley, 6s. net.

*Engineering review*, Sept. 15, 1917, p.87.  $\frac{3}{8}$  col.

"Written with a view to giving in concise form the necessary information upon astronomical surveying to enable a civil engineer to make... calculations which arise in practice... Fulfills its aims quite successfully, and the whole arrangement is concise and clear." E. S. A.

*Nature*, Aug. 30, 1917, p.523.  $\frac{1}{2}$  col.

"Handy and lucid manual dealing with all the problems that arise in field work with a theodolite, namely, determinations of altitude, latitude, azimuth, time, and longitude." *Andrew C. D. Crommelin*.

**Holt, Andrew H.—continued.**

*Revue générale des sciences pures et appliquées*, Oct. 31, 1917, p.587. 1 col.

*Science progress*, Oct. 1917, p.346. ½ p.

"Intended for use by civil engineers and to give sufficient information to enable the observations and computations required in general engineering and surveying to be made. The need was a real one, and is well met." *H. S. J.*

**Holt, Luther Emmett, & Howland, John.**

The diseases of infancy and childhood, for the use of students and practitioners of medicine. Ed.7, rev. 1180 p. 1916. Appleton, \$6.

*Saint Paul medical journal*, Sept. 1917, p.296. ½ col.

"Brought up-to-date with a thorough revision; a number of new articles appear, and others are changed to present the latest teachings. . . Numerous new illustrations appear throughout, and the high standard set by Holt in the past is maintained in this, the seventh edition." *W. D. Beadie.*

**Houston, A. C.**

Rivers as sources of water-supply. Bale, 5s. net.

*Times (London)*; *engineering supplement*, Nov. 30, 1917, p.239. ½ col.

"Reprint of . . . [author's] Harben lectures on water supply, with a short additional chapter on sterilization by chemical means. The lectures were confined to the Thames, which the author . . . has had exceptional opportunities for studying; and they are distinguished by the expression of quite definite conclusions."

**How to lay-out turret lathe tools.** Alfred Herbert, Coventry, 2s. 6d.

*Electrical review (London)*, Sept. 21, 1917, p.275. ½ col.

"This handbook for those who design tools for use on turret and capstan lathes and automatic turning machines, constitutes a decidedly useful addition to the literature on the subject." *G. S. S.*

*Times (London)*; *engineering supplement*, Oct. 26, 1917, p.219. ¼ col.

"A helpful book, in which the broad principles of turret lathe design and practice are explained and freely illustrated in a lucid and entirely practical manner. . . Intended primarily to help those who are unfamiliar with this work."

**Howard, E. E.**

Documents governing the construction of a bridge. 113 p. 1917. Chapman & H., 5s. net.

*Concrete and constructional engineering*, Aug. 1917, p.464. 1 col.

"Reprint of the specifications, proposal, contract and bond of the Columbia River Interstate bridge. . . Well arranged."

**Howe, C. B.**

Mechanical drafting. 147 p. Chapman & H., 7s. 6d. net.

*Electrician*, Nov. 9, 1917, p.196. ¾ col.

"Not intended to be a manual of self-instruction but rather an assistant to the teacher." *A. J. M.*

**Howe, George, & Beard, J. G.**

Latin for pharmacists. 134 p. 1917. Blakiston, \$1.

*American journal of pharmacy*, Nov. 1917, p.556. ¾ p.

"Intended only as a guide for the minimum Latin course prescribed in the Pharmaceutical Syllabus, and is to be supplemented by classroom work. . . Should . . . be well received by students and teachers who have only a minimum amount of time to devote to this subject." *Robert P. Fischells.*

**Hubbard, Prévost.**

Laboratory manual of bituminous materials for the use of students in highway engineering. 153 p. 1916. Wiley, \$1.50 net.

*Analyst*, Sept. 1917, p.320. 1 p.

"Is entirely American and describes American products and American testing methods exclusively. . . Should prove extremely useful to all analysts who have to advise on highway matters." *L. Archbutt.*

*Journal of industrial and engineering chemistry*, Sept. 1917, p.918. ½ col.

"Covers methods of testing, qualitative and quantitative analyses, and the apparatus used therewith, with such careful attention to detail and such clearness of presentation

**Hubbard, Prévost—continued.**

that students and instructors of highway engineering and industrial chemistry now have at hand an ideal textbook for their guidance." *Arthur H. Blanchard.*

*Nature*, Sept. 13, 1917, p.24.  $\frac{3}{4}$  col.

"Should prove of value to municipal and other chemists who may have to deal with the substances in question." *C. S.*

**Hudson, Ralph G. and others.**

Engineers' manual. 310 p. Wiley, \$2 net.

*Electric journal*, Nov. 1917, adv. sec. p.38.  $\frac{3}{8}$  col.

"Fills, in an admirable manner, a demand for a condensed mathematical and engineering handbook... One of the best to come to the reviewer's notice."

*Ironmonger*, Dec. 29, 1917, p.50.  $\frac{1}{3}$  col.

"Constitutes an attempt to gather into one volume formulae and constants commonly recognised by students and practical men engaged in various branches of engineering... Contains a large number of tables selected to facilitate its use under working conditions."

**Hughes, Charles H.**

Handbook of ship calculations, construction and operation. 740 p. 1917. Appleton, \$5 net.

*Electrical record*, Nov. 1917, p.86.  $\frac{1}{4}$  col.

"Intended for use by men employed in ship yards, marine engineers, designers and electricians engaged in practical shipbuilding work... A useful reference in offices of steamship companies for information on loading and stowing of cargoes, maintenance, ship chartering and marine insurance."

*International marine engineering*, Sept. 1917, p.413.  $\frac{3}{8}$  col.

"While the book contains a great deal of extremely useful information and data... it must be obvious at once that the scope of the work is too broad."

*Scientific American*, Nov. 3, 1917, p.340.  $\frac{1}{8}$  col.

"Valuable compilation of practical data in concise form... An effort has been made to include the latest marine practice and the most recent types of construction, not omitting the tanker and the submarine."

**Hughes, Herbert W.**

Text-book on coal-mining. Ed.5. 577 p. 1917. C. Griffin, 24s. net.

*Scientific American*, Nov. 17, 1917, p.375.  $\frac{1}{4}$  col.

"Aims to give in one volume of moderate dimensions all the information necessary to the student and the practical miner."

**Hutchinson, Robert W.**

Advanced text-book of magnetism and electricity. 2v. v.1, 372 p.; v.2, 468 p. 1917. Tutorial, 8s. 6d.

*Electrical review (London)*, Oct. 5, 1917, p.335.  $1\frac{1}{2}$  col.

"Both volumes have some striking features, and, what is of far greater importance, they lack no essential of a sound and useful text-book." *P. H. S. K.*

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, Sept. 1917, p.88.  $\frac{2}{3}$  col.

"The aim... to give a clear and comprehensive account of the main principles of the subject in the light of the results of modern research appears to be amply attained... The subject matter is lightened and illustrated by numerous diagrams." *H. A. W.*

*Science progress*, Oct. 1917, p.348.  $\frac{1}{2}$  p.

"Written to cover the ground of the Final Degree Examinations of the Universities... For its professed purpose the book seems admirably fitted. The text is carefully written; diagrams are clear and abundant, and there are a considerable number of fully-worked examples... To all students reading for their final degree the book can be heartily recommended." *J. Rice.*

**Hutchison, Robert.**

Food and the principles of dietetics. Ed.4. 617 p. 1917. Wood, \$4.

*Journal of home economics*, Sept. 1917, p.433.  $2\frac{1}{2}$  col.

"Remarkable among text-books on dietetics, for the numerous citations of original investigations with which its statements are supported... Remarkable for its clearness of style and for its practical applications of scientific knowledge." *Minna C. Denton.*



**Ibis.** See **Slater**, William Lutley.

**Innes**, William T.

Goldfish varieties and tropical aquarium fishes.

*Zoological Society Bulletin*, Nov. 1917, p.1553.  $\frac{1}{2}$  col.

"Is well printed, well illustrated, and its matter is well represented."

**Jackson**, Dennis E.

Experimental pharmacology. 536 p. 1917. Mosby, \$4.

*Science*, Oct. 19, 1917, p.388. 4 col.

"A unique and interesting work and will be found helpful by the pharmacologist, especially in the execution of some particular kind of work." *David I. Macht*.

**Jackson**, Dugald Caleb, & **McGrath**, D. J.

Street railway fares. 155 p. 1917. McGraw. (Massachusetts Institute of Technology—Research division bulletin 14.)

*Railway age gazette*, Dec. 14, 1917, p.1066.  $\frac{1}{2}$  col.

"Contents of this book comprise data collected and conclusions reached in a research on electric railway traffic and fares...Data were broadly investigated for many years back, and were carried up to the present."

**Jears**, J. H.

Dynamical theory of gases. Ed.2. 436 p. 1916. Cambridge University Press, \$4.

*Physical review*, Nov. 1917, p.589.  $\frac{3}{4}$  p.

"Primary aim...was to develop the theory of gases upon as exact a mathematical basis as possible...A valued addition to the library of any one interested in the study of the dynamical theory of gases." *N. E. D.*

**Jenkinson**, J. W.

Three lectures on experimental embryology. 130 p. 1917. Clarendon Press, 7s. 6d. net.

*Science progress*, Oct. 1917, p.355.  $\frac{1}{2}$  p.

"A useful literature list and index are added. The whole forms a terse, but very instructive and suggestive review of the fascinating study of experimental embryology in regard to the very early stages." *C. H. O'D.*

**Johns Hopkins University**—Department of engineering.

J. E. Aldred lectures on engineering practice. 254 p. Johns Hopkins Press, \$1, unb.

*Electric railway journal*, Nov. 10, 1917, p.884.  $\frac{1}{4}$  col.

"First series of a course of lectures established about a year ago in the department of engineering of the Johns Hopkins University."

*Journal of the Franklin Institute*, Dec. 1917, p.919.  $\frac{2}{3}$  p.

"Lectures deal...with everyday working methods of design, construction, and operation rather than with underlying theory." *Lucien E. Picolet*.

**Johnson**, J. E. jr.

Blast-furnace construction in America. 415 p. McGraw, \$4.

*Iron age*, Nov. 15, 1917, p.1226a. 1 col.

"Book is a good one and while perhaps too dogmatically written, it is one which engineers and draftsmen in the blast furnace industry will find of great value." *S. M. Marshall*.

**Johnstone**, Sidney J.

Rare earth industry. 136 p. 1915. Lockwood, 7s. 6d. net.

*Science progress*, July 1917, p.165.  $\frac{1}{3}$  p.

"Includes chapters on thorium, cerium, titanium, zirconium, tantalum, niobium, tungsten, uranium and vanadium, together with a chapter on the manufacture of incandescent mantles, pyrophoric alloys, and electrical glow lamps...Concludes with a section on the industry of the radioactive substances contributed by Alexander S. Russell." *C. S. G.*

**Jones, F. Wood,**

Arboreal man. 230 p. 1916. Longmans, \$2.40 net.

*American anthropologist*, July-Sept. 1917, p.420. 2½ p.

"Deals with evolution as a present-day process and not wholly confined to the past ages. The author's ability... is shown by the remarkably clear and interesting presentation of some complicated anatomical problems. It is in every sense a readable book and none of the evidences advanced can be passed over lightly." *Louie R. Sullivan*.

*Science progress*, July 1917, p.179. 1 p.

"The reader... will certainly find this not only a colorless, but also a bewildering book. Though his pages are crammed with facts, and evidences of original research, they nowhere grip the attention." *W. P. P.*

**Jones, Harry C.**

Nature of solution. 380 p. 1917. Van Nostrand, \$3.50.

*Journal of the American Chemical Society*, Oct. 1917, p.2242. ¾ p.

"A witness to the zeal of its author, and may be commended as a very readable account of the well known work on solutions which has been carried out at Johns Hopkins University." *John Johnston*.

**Jordan, H. E. & Ferguson, J. S.**

Text-book of histology. 799 p. 1916. Appleton, 15s. net.

*Nature*, Aug. 23, 1917, p.502. 1½ col.

"The clearness of the descriptions, the emphasis of essential points, and the neglect of secondary details combine to make this in our opinion a valuable text-book." *E. W. M.*

**Jørgensen, Ingvar, & Stiles, Walter.**

Carbon assimilation; a review of recent work on the pigments of the green leaf and the processes connected with them. 180 p. 1917. Wesley, 4s. net.

*Science progress*, Oct. 1917, p.351. 1 p.

"The great value of the work lies in the fact that it is no mere résumé, but is throughout severely critical." *V. H. B.*

**Judge, Arthur W.**

High speed internal combustion engines. 350 p. 1916. Macmillan, \$5.50.

*Electrical review (London)*, Sept. 21, 1917, p.276. ½ col.

"Constitutes a compendium of the literature on the subject, and the author is to be congratulated on the thoroughness of his classification. He skilfully analyses and presents in order and sequence the more important of the available theoretical and experimental results." *G. S. S.*

*Electrician*, Nov. 30, 1917, p.310. 1½ col.

"Can be recommended as a work to be on the shelf of every scientific engineer who has to do with the design of petrol motors, and in the library of every engineering college." *A. J. Margetson*.

*Industrial management*, Oct. 1917, p.157. ¼ col.

"A theoretical treatise on the internal combustion engine... Should be of considerable value to technical students and gas engineers in general."

**Judge, Arthur W.**

The properties of aerofoils and aerodynamic bodies; a textbook for aeronautical engineers, draughtsmen and students. 298 p. Macmillan, \$6.

*Industrial management*, Oct. 1917, p.157. ½ col.

"Especially useful to engineers and technical students who are specializing on aeronautical work."

*Nature*, Aug. 16, 1917, p.481. ½ col.

"The author limits the scope of his book to that part of aerodynamics which refers specifically to the performance of an aeroplane."

*Times (London); engineering supplement*, May 25, 1917, p.119. ½ col.

"So well has the author done his work that it may well become a standard work. Theory, the results of tests on models, empirical rules, and suggestions as to the treatment of the different problems of design, have been blended together in a most excellent manner for the use of designers, draughtsmen, and students."

**Kaye, G. W. C.**

X-rays. Ed.2, rev. & enl. 285 p. 1917. Longmans, \$3 net.

*Physical review*, Oct. 1917, p.413.  $\frac{1}{3}$  p.

"Contains brief accounts of some (not all) of the important papers that have been published on X-rays up to the middle of 1916." *W. D.*

*Science progress*, July 1917, p.163.  $\frac{3}{8}$  p.

"Remains unchallenged as the best complete account of the theory and technique of X-ray work." *D. O. W.*

**Kehl, Robert J.**

Oxy-acetylene welding practice. 112 p. Am. Technical Soc., \$1.

*National engineer*, Nov. 1917, p.514.  $\frac{1}{2}$  col.

"Covers the details of the oxy-acetylene process, its advantages, gases used, generators, blowpipes, preparation of the work, flux, and oxy-acetylene cutting."

*Scientific American*, Nov. 3, 1917, p.340. 1-7 col.

**Kennelly, A. E.**

Application of hyperbolic functions to electrical engineering problems. Ed.2. 302 p. McGraw, \$2.50.

*Electrical world*, Dec. 1, 1917, p.1962.  $\frac{1}{3}$  col.

"Devoted to the application of hyperbolic functions to the solution of problems on alternating-current power lines and on wire telegraphy and telephony."

**Kerr, George L.**

Elementary coal mining. Ed.4, rev. 225 p. 1916. C. Griffin, 3s. 6d. net.

*Colliery guardian*, Sept. 7, 1917, p.449.  $\frac{1}{2}$  col.

"Designed to meet the requirements of students...and of miners and others engaged in practical work."

**Kester, Roy B.**

Accounting theory and practice. Ronald.

*Journal of accountancy*, Dec. 1917, p.488. 1  $\frac{3}{4}$  p.

"An excellent piece of work." *W. H. L.*

**Keyser, Cassius J.**

The human worth of rigorous thinking. 314 p. 1916. Columbia University Press, \$1.75.

*Nature*, Dec. 27, 1917, p.321.  $\frac{3}{8}$  col.

**Kinne, Helen, & Cooley, A. M.**

Foods and household management; a text-book of the household arts. Macmillan, \$1.10.

*American forestry*, Dec. 1917, p.760.  $\frac{1}{3}$  col.

"For use in high schools and normal schools...Offers a valuable adjunct to the course in household arts...Includes approximately 160 carefully selected recipes and a large number of cooking exercises of more experimental nature, designed to develop initiative and resourcefulness...Practical and economical."

**Kinne, Helen, & Cooley, A. M.**

The home and the family. 1917. Macmillan, 3s. 6d. net.

*Nature*, Sept. 6, 1917, p.3.  $\frac{1}{2}$  col.

"Written in story form, and is intended for use as an elementary reader in elementary schools."

**Kinney, J. P.**

Development of forest law in America. Wiley.

*American forestry*, Oct. 1917, p.632.  $\frac{1}{2}$  col.

"A mass of useful information...Important for all who are in any way interested in forestry laws."



**Kirk, Alice Gitchell.**

Practical food economy. 256 p. 1917. Little, \$1.25 net.

*Scientific American*, Dec. 1, 1917, p.431.  $\frac{3}{8}$  col.

"There are most helpful suggestions for buying, preparing and cooking without waste, the food values of the cheaper products are emphasized, and there is much sound advice as to the arrangement of the kitchen furniture and the proper use of various fuels, ovens and utensils."

**Kitson, Arthur.**

Trade fallacies. 279 p. P. S. King & Son. Ltd., 3s. 6d.

*Engineering review*, Sept. 15, 1917, p.85.  $2\frac{1}{2}$  col.

"Lively, pointed, and definite, dealing in vigorous style with particular facts, incidents, and ideas current at the time of writing; but it lacks system, and the reader is left to construct for himself the principles upon which the arguments are founded as best he may." *W. S. M.*

*Ironmonger*, Nov. 3, 1917, p.60. 1 col.

"The seventeen chapters that compose this volume appeared as weekly articles in *Land and Water*... Time has already visited some of his plans with condemnation as in due course it will overtake others."

**Klein, Arthur Warner.**

Kinematics of machinery. 227 p. McGraw, \$2.50.

*Machinery*, Jan. 1918, p.480.  $\frac{1}{2}$  col.

"The outcome of many years of experience in teaching the subject of kinematics at the Lehigh University, where the author is professor of mechanical engineering... Unfortunately... is not provided with any index."

**Knobel, Edward Ball.**

Ulugh Beg's catalogue of stars; revised from all Persian manuscripts existing in Great Britain, with a vocabulary of Persian and Arabic words. 109 p. 1917. Carnegie Institution of Washington, \$2. (Publication no.250.)

*Nature*, Nov. 8, 1917, p.185.  $1\frac{3}{8}$  col.

"This catalogue of 1018 stars, the first original catalogue since that of Ptolemy, is founded on observations made during the reign of Ulugh Beg, a grandson of Tamerlane, at his observatory near Samarkand, the epoch being A. D. 1437." *J. L. E. D.*

*Science*, Oct. 12, 1917, p.365. 1 col.

"While it is eminently worth while to preserve such a catalogue, if only for historical purposes, great care should be taken not to place too much dependence upon its star positions." *Benjamin Ross.*

**Knoeppel, C. E.**

Industrial preparedness. 145 p. 1916. Eng. Mag., \$1.

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820. 4 l.

"A study of Germany's military and industrial preparedness intended, the author states, to point the way to national greatness through the right kind of social, industrial and military preparedness."

**Kozmin, Peter A.**

Flour milling; a theoretical and practical handbook of flour manufacture for millers, millwrights, flour-milling engineers and others engaged in the industry; tr. by M. Falkner and Theodor Fjelstrup. Routledge, 21s. net.

*Engineering*, Aug. 10, 1917, p.156. 4 col.

"Will remain a standard work till inevitable onward progress calls for a later exponent of more modern methods."

**Kunz, F. C.**

Design of steel bridges; theory and practice for the use of civil engineers and students. 472 p. 1915. McGraw, 21s. net.

*Engineering*, Aug. 17, 1917, p.180. 2 col.

"Planned with judgment, the subject is treated with a regard to orderly sequence of the matters studied... It is not a 'first book,' the reader being supposed already familiar

**Kunz, F. C.—continued.**

to a considerable degree with the study of bridgework...The author's treatment of his subject is marked by a broad-minded view of what has been achieved in bridge engineering in various parts of the world."

**Kuser, John Dryden.**

The way to study birds. 85 p. Putnam.

*Bird lore*, Sept.-Oct. 1917, p.278. 1¼ col.

"Mr. Kuser has made good use of his eighty-five pages...Nine full-page colored plates by Fuertes add greatly to the beauty, value, and interest of the book." F. M. C.

**Kuss, Robert H.**

Steam boilers. 92 p. 1917. Am. Technical Soc.

*Industrial management*, Sept. 1917, p.950. ½ col.

"Written in unusually clear and concise style."

*National engineer*, Nov. 1917, p.514. ¾ col.

"Aim...is...to cover in a very practical manner...the methods of construction of ordinary and unusual types of boilers, the proper testing of the materials used, the methods of riveting and staying and finally a careful discussion of types of stationary and marine boilers on the market."

**Lamb, Arthur B.**

Laboratory manual of general chemistry (with exercises in the preparation of inorganic substances). Ed.1. 150 p. 1916. Harvard University Press.

*Journal of the American Chemical Society*, Nov. 1917, p.2515. 1 p.

"Outstanding feature...is this attempt to give the student some idea of each experiment before the experiment itself is begun...The treatment is highly practical and abounds in sound and systematic deductions." *William J. Hale*.

**Lanchester, F. W.**

The flying machine from an engineering standpoint. 135 p. 1916. Constable, 4s. 6d. net.

*Science progress*, July 1917, p.182. ½ p.

"Should have been published under the title of 'The Flying Machine from an Engineering Standpoint in 1913.'" *J. Wemyss Anderson*.

**Lankester, Sir Edwin Ray, ed.**

Science and education; lectures delivered at the Royal Institution of Great Britain. 200 p. 1917. Heinemann, 1s. net.

*Nature*, May 3, 1917, p.183. ½ col.

"These lectures were given at the Royal Institution in 1854...Should be read by every one interested in education." *D. J.*

**La Vallée Poussin, C. de.**

Intégrales de Lebesgue; fonctions d'ensemble; classes de Baire. 154 p. 1916. Gauthier-Villars, Paris, 7 fr.

*Revue générale des sciences pures et appliquées*, Aug. 15-31, 1917, p.477. 1 col.

**Lawrence, R. R.**

Principles of alternating-current machinery. 614 p. Hill Pub. Co., 18s. 9d. net.

*Electrician*, Sept. 14, 1917, p.935. 1½ col.

"Probably the best that has been written on the elementary principles of alternating-current machinery, and as such is worthy of a place on the shelves of electrical libraries."

**Laws, A. R. & Todd, G. W.**

Introduction to heat. 212 p. Mills & Boon, 2s. 6d.

*Science progress*, July 1917, p.163. ¾ col.

"Designed as a text-book and a laboratory manual for beginners...The choice and arrangement of the subject matter is excellent." *J. Rice*.

**Laws, Frank A.**

Electrical measurements. 720 p. McGraw, \$5.

*Electrical world*, Dec. 1, 1917, p.1062. ½ col.

"Excellent textbook on electrical measurements for the classroom and technical laboratory."

**Le Bas, Gervase.**

Molecular volumes of liquid chemical compounds from the point of view of Kopp. 275 p. 1915. Longmans, 7s. 6d. net.

*Science progress*, July 1917, p.166. ¾ p.

"Constitutes the first attempt in English to collect and systematise in one compass the known data on molecular volumes." C. S. G.

**Leclerc, Max.**

La formation des ingénieurs à l'étranger et en France. 142 p. Colin, Paris, 2 fr. 40.

*Iron and coal trades review*, Sept. 28, 1917, p.358. ½ col.

"Deals...with the topical problems of the training of engineers, the collaboration of science and industry, etc."

*Practical engineer*, Sept. 6, 1917, p.113. 1 col.

"A plea for practical training of our engineers, and a warning against over-organisation on narrow specialised lines."

**Leutwiler, O. A.**

Elements of machine design. 607 p. McGraw, \$4 net.

*Machinery*, Nov. 1917, p.282. 15 l.

"Heartily recommended to all needing a modern work on the elements of machine design."

**Levi-Malvano, Mario.**

Tempera e cementazione dell' acciaio. 261 p. 1917. Hoepli, Milan, 4 lire.

*Nature*, Aug. 16, 1917, p.483. ¼ col.

"Attempts to give in a small compass a comprehensive account of the hardening of steel for industrial purposes. A thoroughly up-to-date little manual." E. S. H.

**Lewis, Henry Foster, & Roulet, Alfred de.**

Handbook of gynecology for students and practitioners. Mosby.

*American journal of nursing*, Sept. 1917, p.1243. ½ p.

"For physicians and medical students, but of use as a reference book for nurses."

**Licks, H. E.**

Recreations in mathematics. 155 p. 1917. Van Nostrand, \$1.25.

*Science*, Aug. 31, 1917, p.215. ½ col.

"Amusing little book with various problems of more or less interest, particularly to the teacher of elementary mathematics." *Louis C. Karpinski*.

**Liveing, G. D. & Dewar, J.**

Collected papers on spectroscopy. 556 p. 1915. Cambridge University Press, 30s.

*Astrophysical journal*, Oct. 1917, p.238. 2½ p.

"Has a value entirely its own, given to it partly by the high standing of its joint authors, partly by the inherent importance of the results set forth...Filled with keen observations and cleverly devised experiments...There is a spirit of careful scholarship which no camouflage can ever imitate." H. C.

**Lloyd, H. G.**

Lloyd's diagram of calculations. E. & F. N. Spon, 2s. 6d. net.

*Electrical review (London)*, Nov. 23, 1917, p.490. ¼ col.

"An ingenious diagram, with which multiplication, division, proportion, involution and evolution, &c., can be performed...Very clever and interesting."



**Lock, R. H.**

Recent progress in the study of variation, heredity and evolution; rev. by L. Doncaster. 336 p. 1916. Murray, 6s. net.

*Science progress*, July 1917, p.176.  $\frac{1}{2}$  p.

"Can thoroughly be recommended to all who desire to get an introduction to the modern results and theories concerning the problems indicated in its title." *C. H. O'D.*

**Lockwood's** directory of the paper and stationery trades. 786 p. Lockwood Trade Journal Co., N. Y., \$5.

*American industries*, Nov. 1917, p.42.  $\frac{1}{2}$  col.

"Comprises a description of all the paper, wood pulp and chemical fibre mills in the United States, Canada, Mexico, and South America, geographically arranged, the information including the names of officers, statement of mill equipment, kind of power used, kind of product made and capacity of plant."

**Long, H. C.**

Plants poisonous to live stock. 119 p. 1917. Cambridge University Press, 6s. net. (Cambridge agricultural monographs.)

*Nature*, Aug. 23, 1917, p.501.  $\frac{1}{2}$  col.

"Handy work of reference in a subject on which the literature is remarkably scattered. . . Will be of great value to those responsible for the care and treatment of animals."

**Lotsy, J. P.**

Evolution by means of hybridization. 166 p. 1916. Nijhoff, The Hague, 6s.

*Revue générale des sciences pures et appliquées*, Nov. 15, 1917, p.618.  $1\frac{1}{4}$  col.

**Lough, William H.**

Business finance. 631 p. 1917. Ronald, \$3.

*American industries*, Nov. 1917, p.42.  $1\frac{1}{2}$  col.

"Breaks fresh ground in a field hitherto barren of any great amount of worth-while literature, and hence its inherent excellence is enhanced by the dearth of competitors."

**Love, Clyde E.**

Differential and integral calculus. 344 p. 1916. Macmillan, 9s. net.

*Science progress*, July 1917, p.159.  $\frac{3}{4}$  p.

"Possesses some features of great value. . . It does not seem that the frequent use of 'it can be shown' . . . and 'it is evident' . . . quite without any further explanation, is good policy in teaching higher mathematics." *Philip E. B. Jourdain.*

**Lovelace, B. F.** See **Annual** chemical directory of the United States.

**Lovibond, J. W.**

Light and colour theories and their relation to colour standardization.

*Chemical engineer*, Nov. 1917, p.25.  $\frac{1}{4}$  col.

"Concerned with those methods of analyzing, measuring and recording the colors of objects which have proved of practical value in industrial applications."

**Luckiesh, M.**

Colour and its applications. 357 p. Constable, 16s. net.

*Electrician*, Sept. 14, 1917, p.932.  $\frac{1}{2}$  col.

"Essentially of a specialised character and contains much that is the result of the author's own researches. . . In many respects the work breaks new ground." *J. S. D.*

**Lull, Richard Swann.**

Organic evolution. 729 p. 1917. Macmillan, \$3.

*Journal of heredity*, Jan. 1918, p.32.  $\frac{1}{2}$  col.

"Will be welcomed by students of evolution who want in accessible form the facts in the family history of animals. . . The more general part. . . shows little knowledge of the modern work in heredity. . . Apart from this, the book can be warmly recommended."

*Transactions of the American Microscopical Society*, Oct. 1917, p.281.  $\frac{3}{4}$  p.

"Comprehensive statement of the more important facts and theories relating to organic evolution. . . Contains a perfectly stupendous amount of material. . . Well indexed and illustrated."

**Lunge, George.**

Coal-tar and ammonia. Ed.5, rev. 3v. 1916. Gurney & J. £3, 3s.

v.1-2. Coal tar.

v.3. Ammonia.

*Analyst*, Aug. 1917, p.289. 3½ p.

"The work no longer is worthy of Professor Lunge's former great repute as an authoritative guide to the branches of industrial chemistry with which it deals."

**Lunge, George.**

Manufacture of sulphuric acid and alkali, with the collateral branches; a theoretical and practical treatise. Ed.4, supplement to v.1: Sulphuric and nitric acid. 347 p. 1917. Van Nostrand, \$5.

*Science*, Nov. 2, 1917, p.438. 2¼ col.

"All the new matter is printed consecutively with reference to the paging of the original, quite like a volume of footnotes...To the technological student it is unexpectedly readable, furnishing...a complete review of the progress of the acid industry for the past four years...Contains at least brief descriptions of practically all patents bearing on the subject during the period covered...and the information regarding progress in Germany during the war is probably fuller than has elsewhere appeared...Contains a full author and subject index...both to the original fourth edition and to the supplement." *James Lewis Howe*.

**Lunge, George.**

Technical chemists' handbook. Ed.2. Van Nostrand, \$3.50 net.

*Journal of industrial and engineering chemistry*, Dec. 1917, p.1157. ¾ col.

"Chief purpose has been to revise the numerical data of the work on the basis of the report for 1916 of the International Committee on Atomic Weights." *E. S. Johnson*.

**Lusk, Graham.**

Elements of the science of nutrition. Ed.3, rev. 641 p. 1917. Saunders, \$4.50 net.

*Journal of the American Chemical Society*, Nov. 1917, p.2516. ¾ p.

"Carries out in splendid manner the aim of the previous editions, namely, 'to review the scientific substratum upon which rests present-day knowledge of nutrition both in health and disease.'" *Frank P. Underhill*.

*Science*, Dec. 28, 1917, p.641. 3 col.

"The style and mode of treatment of the problems of nutrition remain essentially unchanged in the new edition. The historical method has been followed in a way that can not fail to interest those who are more familiar with the subject-matter, and that ought to enthruse the beginner." *Lafayette B. Mendel*.

**Lyndon, Lamar.**

Hydro-electric power. v.1: Hydraulic development and equipment. Hill Pub. Co., 21s. net.

*Electrical review (London)*, Nov. 2, 1917, p.432. ¾ col.

"The details...are treated in a masterly fashion, the data and illustrations referring chiefly to water power practice in the United States of America." *E. K. S.*

**McAdie, Alexander.**

Principles of aërography. 318 p. 1917. Rand, \$3.

*Astrophysical journal*, Nov. 1917, p.301. 3½ p.

"Well printed on paper calculated to make the illustrations appear at their best... The index is particularly well arranged and useful...A very valuable contribution to meteorological literature." *W. I. M.*

*Science*, Sept. 4, 1917, p.264. 2½ col.

"'Stress is laid on modern methods of attack and the practical application of whatever knowledge is already available.' Of greatest value as a reference accompaniment to a well ordered course in meteorology." *Charles F. Brooks*.

*Scientific American*, Dec. 22, 1917, p.488. ½ col.

"Gives us much new material, set forth with such an eye to economic applications and such enthusiasm for the marvelous features of his subject that the interest of the reader and student is immediately caught and held."

**McCarrison, R.**

The thyroid gland in health and disease. 286 p. 1917. Baillière, 12s. 6d. net.

*Nature*, Nov. 15, 1917, p.202. 1¾ col.

"Of peculiar value in that the author has an intimate experimental and clinical acquaintance with the subject... Full of interesting information, and will be welcomed by physiologists and medical men generally." *P. T. Herring*.

**McClendon, J. F.**

Physical chemistry of vital phenomena, for students and investigators in the biological and medical sciences. 240 p. 1917. Princeton Univ. Press.

*Botanical gazette*, Nov. 1917, p.438. 1½ p.

"Has performed a valuable service to biologists by organizing the more important facts and principles of physical chemistry that have to do with biological problems." *George B. Rigg*.

*Science*, Dec. 7, 1917, p.565. 3¼ col.

**McCullough, Ernest.**

Practical structural design. 303 p. 1917. U. P. C. Book Co., \$2.50.

*Building age*, Nov. 1917, p.640. 1 col.

"Author is a man of wide practical experience... His high professional standing and well-known literary ability bespeak for the work a warm welcome."

*Journal of the Franklin Institute*, Nov. 1917, p.735. ½ p.

"Very practical as well as deductive in treatment and is well adapted to the needs of evening-school students." *Lucien E. Picolet*.

**MacDonald, Hugh V. comp.**

Printing and its essential points. 158 p. Board of Education, New Haven, Conn.

*American industries*, Dec. 1917, p.42. 1¼ col.

"Will be found most valuable to any interested in learning the underlying principles of the printing art... Represents a long stride in the right direction towards industrial education."

**McDonough, M. T.**

Scientific mining. 110 p. Author, Wheeling, W. Va., \$3.50.

*Coal and coke operator*, Dec. 1917, p.147. 10 l.

"Compendium of information accumulated by the author during his experience of 40 years underground and should prove interesting to every operating man in the coal mining industry."

**Maclean, Magnus.**

Electrical laboratory course for junior students. Enl. and rev. 120 p. Blackie, 2s. net.

*Electrician*, Oct. 5, 1917, p.17. ½ col.

"[The] additions to a book which already contained the simpler and fundamental facts of the science clearly demonstrated by a very comprehensive course of experiments on electric and magnetic measurements, cannot fail to be appreciated by teachers of electrical engineering." *B. W. C.*

Revision of work compiled by Archibald & Rankin and issued by same publisher in 1908.

**MacRobert, Thomas M.**

Functions of a complex variable. 298 p. Macmillan, 12s. net.

*Electrician*, Aug. 31, 1917, p.856. 1 col.

"We can recommend this book to the physical mathematician as a very clear introduction to a most difficult subject. The great care which has been exercised in proof reading is highly commendable." *A. Russell*.

*Science progress*, July 1917, p.159. ¾ p.

"Has certain advantages as a text-book." *Philip E. B. Jourdain*.



**Mager, Henri.**

Les influences des corps minéraux. Dunod & Pinat, Paris, 5 fr.

*Iron and coal trades review*, Sept. 28, 1917, p.358. ⅓ col.

"Describes...how subterranean water or minerals must be sought for and can be found either by the so-called 'divining rod' or a specially designed 'pendulum,' both of which are fully explained."

**Mahin, John Lee.**

Advertising; selling the consumer. Ed.2. 298 p. 1916. Doubleday, \$4 net.

*Tea and coffee trade journal*, Sept. 1917, p.230. ¾ col.

"Is the outgrowth of a series of lectures delivered by the author at the Northwestern University, and presents a comprehensive survey of modern advertising in every field."

**Mahin, John Lee.**

Mahin's advertising data book. 260 p. Author, New York, \$2 net.

*Tea and coffee trade journal*, Sept. 1917, p.230. ¼ col.

"Useful handbook containing facts, figures, formulas, methods and statistics which every business man and advertiser will find convenient to have near at hand throughout the business day."

**Maiden, J. H.**

A critical revision of the genus *Eucalyptus*, v.3, pt. 9-10; v.4, pt.1. Government of New South Wales, Sydney, 2s. 6d. per part.

*American journal of pharmacy*, Nov. 1917, p.556. ¾ p.

"A further elaboration and continuation of the *Eucalyptographia* of his predecessor Baron Ferd. v. Muller, and is destined to be a masterpiece of monographing." *G. M. B.*

**Maillot, L.**

Le manuel du mécanicien; métaux usuels, trempe, recuit, ajustage, tournage, filetage, fraisage, meulage, outils de mesure et de vérification annexe. Ed.2, rev. 173 p. Dunod & Pinat, Paris, 2 fr. 75.

*Le Génie civil*, Sept. 1, 1917, p.148. ⅓ col.

**Malcolm, H. W.**

Theory of the submarine telegraph and telephone cable. 565 p. [1917.] *Electrician*, 18s. (*Electrician series*.)

*Electrical world*, Jan. 5, 1918, p.50. ¼ col.

"Good text book on the mathematical theory of submarine-cable telegraphy and telephony...Will be of great value as a reference book to cable telegraphists and to students of electric signaling who have had a good mathematical training."

*Electrician*, Sept. 21, 1917, p.970. 2½ col.

"It is impossible to overrate the importance of Dr. Malcolm's treatise, or sufficiently to admire the immense amount of work and ability it has involved." *Charles V. Drysdale*.

*Nature*, Nov. 15, 1917, p.201. 2¾ col.

"Cable engineers...are alive to the necessity of making continual improvements in their methods, and a book like Dr. Malcolm's should prove a great help to them...We can heartily recommend the book to cable and telephone engineers and to physical mathematicians desiring subjects for research." *A. Kussell*.

**Mallik, D. N.**

Optical theories; based on lectures delivered before the Calcutta University. 181 p. 1917. Cambridge University Press, 7s. 6d. net.

*Nature*, Oct. 4, 1917, p.83. 1 col.

"Written for fairly advanced students, and the discussion necessarily is mainly mathematical."

**Malphettes, Léopold.**

Le béton armé à la portée de tous. 330 p. 1917. Dunod & Pinat, Paris, 12 fr.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.154. 1½ p.

*Le Génie civil*, Aug. 11, 1917, p.100. ¾ col.

**Mann, C. Riborg.**

Teaching of physics. 304 p. 1915. Macmillan, 5s. net. (Teachers' professional library.)

*Science progress*, Oct. 1917, p.347. 1 p.

**Manson, J. Leask.**

Experimental building science. v.1. 210 p. 1917. Cambridge University Press, 6s. net. (Cambridge technical series.)

*Concrete and constructional engineering*, Aug. 1917, p.464. 1 p.

"A great advance on anything of the kind the writer has seen...The explanations are clear and accurate, and the whole book is thoroughly readable."

*Journal of the Royal Sanitary Institute*, Oct. 1917, sup. p.37. ¼ p.

"A Students' text book, but is will be of considerable value as a work of reference for any Architect, Clerk of Works, or Sanitary Inspector." *A. S.*

*Nature*, Aug. 16, 1917, p.483. ½ col.

"An indication of the more intimate relations which are growing up between pure science and industry. A laboratory manual...capable of a wide application."

**Manufacture** of artillery ammunition, by members of the editorial staff of the "American machinist," L. P. Alford, editor-in-chief. 759 p. 1916. McGraw, \$6 net.

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.819. ½ col.

"An excellent volume from a practical viewpoint." *Frederick A. Waldron.*

**Maraval, Madeleine.**

Ma pratique des conserves de fruits et légumes et de quelques autres aliments. Ed.2. 244 p. 1917. Librairie agricole, Paris, 3 fr. 50.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.153. ¾ p.

**March, Herman W. & Wolff, H. C.**

Calculus. 360 p. 1917. McGraw, \$2.

*Canadian engineer*, Sept. 27, 1917, p.283. ½ col.

"Treatment...is characterized by good judgment and sound commonsense...Will be found to be a very valuable book for use with classes." *Alfred Baker.*

**Marguet, F.**

Histoire de la longitude à la mer, au XVIIIe siècle, en France. 227 p. 1917. Challamel, Paris, 7 fr. 50.

*Revue générale des sciences pures et appliquées*, Nov. 15, 1917, p.616. 2½ col.

**Marret, Gaston.**

Le châssis automobile; cadre, suspension, roues, moteur, embrayage, changements de vitesse, transmission, direction, freins. 147 p. Dunod & Pinat, Paris, 5 fr. 50.

*Le Génie civil*, Sept. 1, 1917, p.148. ½ col.

**Marshall, Arthur.**

Explosives; their manufacture, tests, properties and history. Ed.2. 2v. Blakiston, \$16 net.

v.1. 408 p.

v.2. 387 p.

*Analyst*, Sept. 1917, p.321. ¾ p.

"Of special interest to analytical chemists as it deals very fully with the analysis of explosives...The whole compilation cannot...fail to be very useful for reference, and will undoubtedly lighten the labor of many analysts." *R. C. Farmer.*

*Journal of the Franklin Institute*, Oct. 1917, p.578. 1 p.

"Stands, at present, as the best exposition in English of the subject on which it treats." *Henry Leffmann.*

*Metallurgical and chemical engineering*, Oct. 15, 1917, p.503. 1½ col.

"Most comprehensive work on the subject yet published and is up to date...The two volumes are extensively and separately indexed both as to subjects and names, making the work quite available for reference...The name index and the copious references in the text constitute a comprehensive bibliography."

**Marshall, Arthur—continued.**

*Nature*, Oct. 11, 1917, p.101, (review of v.2). 2 col.

"Divided into four parts, dealing respectively with the properties of Explosives, Special Explosives, Stability, and the Analysis of Materials. . . Second edition places the book amongst the best technical books which have been written. It is by far the most complete exposition on the subject which has appeared."

*Scientific American*, Oct. 20, 1917, p.303. ¼ col.

"The second edition of this substantial and valuable work uses much new material in text and illustration."

**Marshall, Arthur.**

Short account of explosives. 96 p. 1917. Churchill, 5s. net.

*Chemical news*, Dec. 7, 1917, p.281. ¼ col.

"Provides very interesting information. . . giving a clear account of the various explosives which have come into use in recent years, and describing accurately the processes involved in making them. The characteristic properties of military and commercial high explosives are fully discussed."

*Engineer*, Oct. 19, 1917, p.342. ⅓ col.

"Deals with its subject in a clear, concise, and authoritative manner."

*Iron and coal trades review*, Sept. 28, 1917, p.358. 11 l.

"A kind of greatly abbreviated edition of the same author's well-received 'Explosives' . . . The most recent facts have been included, so far as the interests of the State would permit."

*Mining magazine*, Oct. 1917, p.197. 11 l.

"Many engineers nowadays are having to pay attention to explosives, a subject on which their previous knowledge and experience have been practically nil. This book meets their requirements excellently."

**Martin, Geoffrey.**

Chlorine and chlorine products. 100 p. 1915. Lockwood, 7s. 6d. net.

*Science progress*, July 1917, p.165. ¼ p.

**Martin, Geoffrey.**

Industrial and manufacturing chemistry. 2v. 482 p. 1917. Lockwood, 25s. net.

pt.2, v.2. Inorganic.

*Brick and pottery trades journal*, Oct. 1, 1917, p.218. 1 col.

"Contain sections on all the leading departments of modern industries, in so far as these have a chemical basis."

*Chemical news*, Sept. 14, 1917, p.138, (review of pt.2, v.2). ¼ col.

"Deals with a great diversity of subjects, which are all treated as adequately as the limitations of space will allow."

*Journal of the Society of Chemical Industry*, Aug. 31, 1917, p.946, (review of pt. 2, v.2). ⅔ col.

"Is arranged on the same principle as the first part of the work, each subject being treated very briefly, and references to literature provided."

**Martin, Geoffrey, & Barbour, William.**

Industrial nitrogen compounds and explosives. 125 p. 1915. Lockwood, 7s. 6d. net.

*Science progress*, July 1917, p.165. ½ p.

**Masius, Morton.**

Problems in general physics. 90 p. 1917. Blakiston, \$90.

*American journal of science*, Nov. 1917, p.404. ½ p.

"Contains 1000 problems and. . . covers the entire field usually taught in engineering colleges. . . The problems seem to have been carefully selected and arranged. The only obvious drawback. . . consists in the unnecessarily small type used." *H. S. U.*

*Scientific American*, Dec. 22, 1917, p.488. 12 l.

"Based upon Duff's Text-Book of Physics, and deals with the mechanics and properties of matter, wave motion, heat, electricity and magnetism, sound, and light."



**Mason, William Pitt.**

Examination of water; chemical and bacteriological. Ed.5. rev. Wiley, \$1.25.

*Canadian engineer*, Sept. 27, 1917, p.283.  $\frac{3}{8}$  col.

"The demand for a further edition... bears testimony to the general excellence of the work and its general utility to both students and laboratory men... Written in a most attractive manner and is very free from typographical errors." *Joseph Race*.

*Journal of industrial and engineering chemistry*, Dec. 1917, p.1158.  $1\frac{1}{2}$  col.

"Methods described are in most instances, those proposed by the Committee of the American Public Health Association." *E. M. Chamot*.

**Mason, William Pitt.**

Water supply (considered principally from an engineering standpoint). Ed.4. 528 p. 1916. Wiley, \$3.75 net.

*Journal of industrial and engineering chemistry*, Oct. 1917, p.998.  $1\frac{1}{4}$  col.

"Considerable portions of this edition have been changed and many additions have been made... Written in a very pleasing style." *Edward Bartow*.

*Times (London)*; *engineering supplement*, Nov. 30, 1917, p.239.  $\frac{1}{2}$  col.

"Principally a compendium of leading data on the relation of water supplies to disease, their sources, and the methods of their purification... Engineers who wish for a convenient summary of available information should find the book of considerable use."

**Massenz, Arturo.**

Guida pratica del meccanico moderno. 351 p. 1917. Hoepli, Milan, 4.50 lire.

*Nature*, Aug. 16, 1917, p.483.  $\frac{1}{2}$  col.

"Intended chiefly for foremen and for students of technical and industrial schools."

**Matsumoto, Hikoshichiro.**

Monograph of Japanese Ophiuroidea, arranged according to a new classification. 408 p. 1917, Imperial Univ. of Tokyo.

*American journal of science*, Nov. 1917, p.404.  $1\frac{1}{2}$  p.

"In this excellent work are noted or described the known living species of ophiurians, numbering 232 species, here grouped into 88 genera." *C. S.*

**Matthews, R. B.**

Aviation pocket-book for 1917; a compendium of modern practice and a collection of useful notes, formulae, rules, tables and data relating to aeronautics. Ed.5. 300 p. 1917. Lockwood, 4s. 6d. net.

*Nature*, Aug. 10, 1917, p.481.  $\frac{3}{8}$  col.

"A good beginning at collecting the skeleton tables and formulae of the aeronautical industry."

**Matthews, William D.**

Insurance engineer's hand book. 680 p. 1916. Insurance Field Co., \$4.

*Scientific American*, Dec. 15, 1917, p.468.  $\frac{1}{2}$  col.

"Serves a double purpose, that of a textbook in fire protection and fire preventive engineering study courses, and that of a reference book comprehensive enough to appeal to the profession and the interested public."

**May, Irville Augustus.**

Street railway accounting. 454 p. Ronald, \$5.

*Electric railway journal*, Nov. 17, 1917, p.925.  $\frac{3}{8}$  col.

"As a practical work the book is most heartily recommended to those interested in electric railway accounting."

*Railway age*, Jan. 11, 1917, p.100.  $\frac{1}{2}$  col.

"Should be read by all bankers, bond buyers and salesmen who deal in public utility securities. It should be of interest also to steam railway accounting officers and executives who are interested in street railway properties because of ownership or as a closely allied industry."

**Maycock, W. Perren.**

Continuous-current motors and control apparatus. 330 p. 1917.  
Whittaker, \$1.75 net.

*Canadian engineer*, Dec. 27, 1917, p.536. ½ col.

"Contains a large quantity of information on control devices. . . Throughout the book are numerical examples worked in detail to make plain the author's methods of attacking problems. . . Anyone desiring to acquire working knowledge of direct-current motors and their control will find this book very useful." *H. W. Price.*

*Model engineer and electrician*, Dec. 13, 1917, p.373. ½ col.

"Should prove very useful to electricians and mechanics engaged in the making of control apparatus, students in technical colleges, electrical contractors, and anyone who has charge of electric power installations."

**Maycock, W. Perren.**

First course of electric-light switching and testing; arranged by  
W. P. Maycock. Lundberg, 10d.

*Electrical review*, Nov. 16, 1917, p.468. ½ col.

"Should prove useful to teachers of practical wiring and other classes where the connection and testing of tumbler-switch circuits form part of the tuition. . . Of the most elementary nature."

**Mayo Clinic, Rochester, Minn.**

Collected papers. v.8, 1916. 1917. Saunders, \$6.50.

*Saint Paul medical journal*, Oct. 1917, p.324. 8 l.

"Covers a wide range of subjects and is a valuable addition to an up-to-date reference library." *Carl B. Drake.*

**Meares, J. W. & Neale, R. E.**

Electrical engineering practice; a practical treatise for civil, mechanical and electrical engineers, with many tables and illustrations. Ed.3. rev. E. & F. N. Spon, 25s. net.

*Electrical review*, Aug. 17, 1917, p.167. 1 col.

"A work which should be a very valuable one, particularly to engineers whose connection with electricity is only secondary. The author's style is exceedingly clear and lucid, and his meaning can always be grasped at a first reading." *G. W. S.*

*Engineering*, Nov. 2, 1917, p.476. 2 col.

**Merriman, M.**

Treatise on hydraulics. Ed.10, rev. 565 p. 1916. Wiley, 18s. 6d. net.

*Nature*, Aug. 16, 1917, p.483. ¾ col.

"Contains supplementary sections which bring the volume up to date. There are copious references to articles in periodicals, other books, transactions of societies, etc."

**Meyer, Adolph F.**

Elements of hydrology. 487 p. 1917. Wiley, \$4.

*Canadian engineer*, Sept. 27, 1917, p.285. 1½ col.

"The first treatise to treat the science of hydrology in a comprehensive manner. . . Very well written and splendidly illustrated with good, live drawings and cannot be criticized from a typographical or literary standpoint." *T. H. Hogg.*

**Meyer, E. B.**

Underground transmission and distribution for electric light and power. 312 p. McGraw, \$3.

*Electrical review (Chicago)*, Oct. 13, 1917, p.656. 1½ col.

"The author is to be congratulated upon the general excellence of the work." *D. W. Roper.*

*Electrical review (London)*, Sept. 21, 1917, p.275. 1½ col.

"As compared with other branches of electrical engineering the literature is scanty, but this book goes far to fill the gap. The subject matter is mainly treated from the American view-point, but there is also a good deal of information concerning standard practice in Europe." *E. K. S.*

*Electrician*, Aug. 31, 1917, p.859. 1½ col.

"Should prove of great value to all those interested in the distribution of electricity. . . Author is to be commended for the good illustrations, forms of agreement and specifications with which the book abounds." *W. A. Toppin.*

**Michigan University.**

Occasional papers of the Museum of Zoology, no. 1-35. 1913-1917. The University, Ann Arbor.

*Science*; Dec. 28, 1917, p.643. 1 col.

"Will appeal especially to the modern systematist, who tries...to take interest in ecology, zoography and the careful noting of life histories." *T. Barbour*.

**Mierzinski, S.**

Water-proofing of fabrics. 140 p. 1914. Scott, Greenwood, 5s. 6d.

*India rubber world*, Oct. 1917, p.28. ¼ col.

"Consists of an index and twelve chapters...The last chapter is by the translators, who comment intelligently upon certain obvious lapses by the German author."

**Miessner, B. F.**

Radiodynamics. 206 p. 1916. Van Nostrand, \$2.

*Physical review*, Oct. 1917, p.412. ½ p.

"The general subject treated is communication by means of radiations and control of moving mechanisms by the same means...Value...lies in its being an up-to-date statement of what has been accomplished and the means employed in the control of mechanisms by means of the various forms of radiant energy." *A. T.*

**Miller, G. A. and others.**

Theory and applications of finite groups. 390 p. 1916. Wiley.

*Bulletin of the American Mathematical Society*, Dec. 1917, p.150. 7 p.

"Written by three recognized authorities on various phases of the subject. Considerable original material is included by each of the authors either in the form of new developments or of simplifications in the proofs of the older theorems. The work is strictly up-to-date; it contains some of the very latest results on the topics treated." *Arthur Ranum*.

**Millikan, Robert Andrews.**

The electron; its isolation and measurement and the determination of some of its properties. 280 p. Univ. of Chicago Press, \$1.50.

*Electrical review (Chicago)*, Nov. 10, 1917, p.822. ¼ col.

"Intended for men of technical training regardless of whether or not they are physicists...Makes interesting reading even for the lay reader and will give him a good idea...as to the most modern views on atoms, electricity and radiant energy." *Albert Scheible*.

Mineral industry; its statistics, technology and trade. v.25, ed. by G. A. Roush. 960 p. 1916. McGraw, \$10.

*Engineering and mining journal*, Dec. 15, 1917, p.1059. ½ col.

"That a work of this kind should be able to hold its own and maintain itself for 25 successive years without any great organization to support it is, perhaps, sufficient proof that it has its place in the mining and mineral world."

*Metallurgical and chemical engineering*, Dec. 1, 1917, p.669. 1 col.

"Fully up to the high standard which has been set in the past, and in certain respects is even more complete."

Mining catalogue for the year 1917. 807 p. Keystone.

*Coal age*, Dec. 8, 1917, p.983. ¾ col.

"Exceedingly well arranged...May well be termed a comprehensive mine directory."

**Moldenke, Richard.**

Principles of iron founding. 517 p. McGraw, \$4 net.

*Compressed air magazine*, Dec. 1917, p.8603. ½ col.

"Must at once take its place as a standard work, a position which it may be expected to deservedly hold for long years to come."

*Engineering news-record*, Dec. 20, 1917, p.1169. 1 col.

"Will be of immediate service to all engineers who are concerned in one way or another with the purchase of cast-iron products, or with the writing of specifications for cast iron, or with the foundry and shop inspection of these articles...One of the most striking characteristics...is the prophetic nature of paragraph after paragraph. For many years to come...will be in advance of the general state of the art and remain a guide to the developing industry."



**Moldenke, Richard**—*continued.*

*Foundry*, Nov. 1917, p.489. 1¾ col.

"Devoted to a subject very worthy of study both by the foundryman, who can make practical use of it, and by the layman who has a desire for knowledge for its own sake."

*Metal industry*, Oct. 1917, p.443. ¾ col.

"Goes into the elements of iron making and its allied industries with the object of drawing conclusions therefrom of value to the foundryman in his daily work...Dr. Moldenke has most ably carried out his desires."

*Metallurgical and chemical engineering*, Nov. 15, 1917, p.612. ½ col.

"It is more human and intuitive than accurately scientific."

**Montessus de Ballore, R. de.**

Leçons sur les fonctions elliptiques en vue de leurs applications. 267 p. 1917. Gauthier-Villars, Paris, 12 fr.

*Science progress*, Oct. 1917, p.344. ¾ p.

"Object...is to set forth in an elementary way the fundamental properties of the elliptic functions...Very complete and thorough work." *Philip E. B. Jourdain.*

**Montgrand, L. de.**

Automobiles, camions et tracteurs; principes et utilisation. Berger-Levrault, Paris, 7 fr. 50.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.628. ½ p.

**Moore, Herbert F.**

Textbook of the materials of engineering. 204 p. McGraw, \$2.

*Engineering news-record*, Nov. 15, 1917, p.940. ¾ col.

"In comparatively brief space he gives all of the essential information regarding the nature of materials used in engineering and outline[s] some of the problems connected with the inspection and testing of those materials."

**Moreau, A.**

L'abattoir moderne; construction, installation, administration. Ed.2, rev. & enl. 936 p. 1916. Aşselin et Houzeau, Paris, 25 fr.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.158. ¾ p.

**Morgan, T. H.**

A critique of the theory of evolution. 197 p. 1916. Princeton Univ. Press, 6s. 6d. net.

*Nature*, May 3, 1917, p.181. 3 col.

"Almost entirely an exposition of certain facts as to inheritance ascertained by experiments with the fruit-fly, *Drosophila ampelophila*, and 'a review of a long series of researches as to the nature of hereditary material'...So far as the title of these lectures...is concerned, there is very little said in them which justifies it." *E. Ray Lankester.*

*Science progress*, Oct. 1917, p.352. ¾ p.

"Very useful to the student, be he beginner or more advanced, and...can be read with profit and considerable pleasure by all interested in biology." *C. H. O'D.*

**Morris, Sir Malcolm.**

The nation's health. 152 p. Funk, \$1.25.

*American journal of public health*, Dec. 1917, p.1053. 1 col.

"This volume on the stamping out of venereal disease deals with a most important aspect of the nation's health, and one that has been brought into emphatic prominence by the war conditions under which most of the nations at the present time are living... That it is also simple and direct in method and most readably clear in style enhances its value for the general public. The symptoms of these 'diseases, their course and sequelae, are set forth in phraseology which the laity can understand." *F. J. Osborne.*

**Morse, Irving H.**

Calculations used in cane sugar factories. Ed.2, rewritten. 185 p. 1917. Wiley.

*Journal of industrial and engineering chemistry*, Oct. 1917, p.998. ¾ col.

"In spite of some hasty proof-reading and careless construction, the book on the whole is clearly written and intelligible. It will undoubtedly prove of much value in sugar laboratories, both of Louisiana sugar houses and tropical sugar houses as well." *Charles E. Coates.*

**Moses, Alfred J. & Parsons, C. L.**

Elements of mineralogy, crystallography and blowpipe analysis. Ed.5, enl. and in large part rewritten. 631 p. 1916. Van Nostrand, \$3.

*Economic geology*, Sept. 1917, p.559. 1 p.

"The increase of nearly 200 pages over the fourth edition (1909) testifies to the enlarged character of this latest edition of Moses and Parsons' well-known 'Elements.' The practical point of view has been consistently maintained, and the chapters on crystallography clearly state the subdivisions, based on symmetry." *W. T. Schaller*.

*Journal of industrial & engineering chemistry*, Dec. 1917, p.1155. 3/8 p.

"Not only an excellent textbook for use in colleges and universities, but... a very good general book on determinative mineralogy." *Joseph Hyde Pratt*.

**Moss, Herbert,**

Heat drop tables; absolute pressures. 63 p. 1917. E. Arnold, 5s. net.

*Colliery guardian*, Sept. 7, 1917, p.449. 1/4 col.

"Based upon the system of formulae due to Prof. H. L. Callender... When the tables are used for the purpose of comparison with an engine test, certain corrections for barometric heights are necessary, and a table is given for this purpose."

*Engineering review*, Nov. 15, 1917, p.144. 1/2 col.

"The method of calculation adopted... is such that there should be no error greater than .01 B. Th. U."

*Iron and coal trades review*, Nov. 16, 1917, p.552. 1/2 col.

**Moullin, C. Mansell.**

Biology of tumours. 55 p. 1916. H. K. Lewis, 2s. 6d. net.

*Science progress*, July 1917, p.181. 1/2 p.

"Has presented his theory, which in some respects is a combination of Cohnheim's theory of 'cell-rests' and Adami's theory of the 'habit of growth,' in a clear and masterly way." *J. W. Cropper*.

**Moyer, James Ambrose.**

Steam turbines; a practical and theoretical treatise for engineers and students. Ed.3. 468 p. 1917. Wiley, \$4 net.

*Canadian engineer*, Aug. 30, 1917, p.188. 1/2 col.

*Nature*, Sept. 20, 1917, p.43. 5/8 col.

*Times (London); engineering supplement*, Aug. 31, 1917, p.179. 1 1/2 col.

"While the volume will give an idea of the principles involved in design and manufacture, it will not bear comparison with the leading British works on the subject."

**Moxey, Louis W. jr.**

The electrical contractor. 86 p. Hill Pub. Co., 6s. 3d. net.

*Electrician*, Sept. 28, 1917, p.1008. 3/4 col.

"Every electrical contractor might usefully provide himself with a copy of this little book." *J. M. M. M.*

**Mucklow, Walter.**

Real estate accounts. Ronald.

*Journal of accountancy*, Dec. 1917, p.485. 2 3/4 p.

"Contains a very full description of all the books and record forms pertaining to the real estate business in its various phases... A pioneer work in its field, a first step toward a uniform system for real estate accounts." *W. H. L.*

**Muguet, A.**

La radioactivité et les principaux corps radioactifs; applications médicales, scientifiques et industrielles. 193 p. 1917. Doin, Paris, 5 fr.

*Moniteur scientifique*, Aug. 1917, sup. p.64. 1 1/2 col.

**Mullens, W. H. & Swann, H. K.**

Bibliography of British ornithology from the earliest times to the end of 1912, including biographical accounts of the principal writers and bibliographies of their published works. pt. 1-6. Macmillan, 6s. net each.

*Nature*, Nov. 8, 1917, p.183. 1 1/4 col.

"With the issue of the sixth part Messrs. Mullens and Swann bring to a conclusion their great 'Bibliography of British Ornithology'... The biographical side of the book can scarcely be considered so satisfactory as the bibliographical portion."

**Mulliken, Samuel P.**

Method for the identification of pure organic compounds. v.2. 327 p. 1916. Wiley, \$5.

*Journal of physical chemistry*, Dec. 1917, p.789. 8 l.

"The second volume of this well-known series (volumes I and III have already appeared) includes the important compounds of Order II, or those containing the elements (a) carbon and nitrogen, (b) carbon, nitrogen and hydrogen, (c) carbon, nitrogen and oxygen, (d) carbon, nitrogen, hydrogen and oxygen... The fourth and concluding volume is promised in the not distant future." *T. R. Briggs.*

*Science progress*, July 1917, p.167. 1 p.

"There is evidence of much conscientious work in the book, but it may be doubted whether the result attained is commensurate with the great labour involved in its production." *P. H.*

**Munday, Albert H.**

The eyes of the army and navy. 227 p. Harper, \$2 & \$1.50.

*Aviation*, Jan. 1, 1918, p.756. 1/3 col.

"It is hard to imagine a work better suited to be used as a textbook by the embryo military or naval aviator... a chapter apiece being devoted to subjects so widely diverse as navigation, theory of flight, wireless telegraphy, meteorology, engines, and photography... Artillery observation, the care of machines, and aerial fighting... are discussed with a clarity and, so far as military exigencies and the department of the realm act permit, with a completeness which leaves nothing to be desired... A particularly commendable feature in a book of this type is that it has been written with a minimum of formulae."

**Municipal journal.**

Practical street construction; planning streets and designing and constructing the details of street surface, subsurface and supersurface structures. 248 p. Municipal Journal, \$2.

*Engineering news-record*, Oct. 18, 1917, p.751. 1 col.

"A wealth of practical information on the alignment, widths, uses and treatment of city highways, combining in one volume a great deal of information which would otherwise have been widely scattered in periodical literature."

**Murdoch, J.**

Microscopical determination of the opaque minerals; an aid to the study of ores. 165 p. 1916. Wiley, 9s. 6d.

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, Sept. 1917, p.87. 1 col.

"Will be of great interest and value not only to mineralogists, but also to the metallurgical chemist, and should open a new field to those studying the economic minerals and who have experienced the limitations of the more familiar methods of examination." *H. R. A.*

*Nature*, Aug. 30, 1917, p.523. 1/2 p.

"A guide to students who wish to study the structure and composition of the opaque metallic ores in the laboratory, by examining the polished surface under the microscope." *J. W. E.*

*Times (London); engineering supplement*, July 27, 1917, p.159. 1/2 col.

"In writing the first book on a new method of research Dr. Murdoch has done a real service to both pure and applied science."

**Muter, John.**

Short manual of analytical chemistry, qualitative and quantitative— inorganic and organic. 6th American ed. by J. Thomas. 237 p. 1917. Blakiston, \$2.

*American journal of science*, Nov. 1917, p.400. 1/4 p.

"In spite of its moderate size and the wide field that it covers, it gives a surprisingly comprehensive amount of information." *H. L. W.*

*Journal of the American Pharmaceutical Association*, Oct. 1917, p.930. 1/4 col.

"This manual, long and favorably known for its concise treatment and practical classification of analytical processes, both qualitative and quantitative, in the present edition retains the general character and scope of former editions." *J. A. K.*

*Midland druggist and pharmaceutical review*, Nov. 1917, p.460. 3/8 p.



**Nagle, J. C.**

Field manual for railroad engineers. Ed.3. 499 p. 1917. Wiley, \$3.

*Canadian engineer*, Dec. 27, 1917, p.536. ½ col.

"Embodies more information of practical usefulness than any field book the writer has seen." *J. R. W. Ambrose*.

**Needham, James G. & Lloyd, J. T.**

The life of inland waters; an elementary text book of fresh-water biology for American students. 438 p. 1916. Comstock Pub. Co., \$3.

*Botanical gazette*, Sept. 1917, p.254. ¼ p.

"Attempts to present in an elementary manner a comprehensive view of our fresh waters as the abode of a teeming multitude of organisms. The viewpoint is essentially ecological, with a background of economic possibilities...The contents may be appreciated by a person with a minimum of scientific attainment." *Geo. D. Fuller*.

**Nernst, Walter.**

Theoretical chemistry from the standpoint of Avogadro's rule and thermodynamics; rev. in accordance with 7th German ed. by H. T. Tizard. 853 p. 1916. Macmillan, 15s. net.

*Journal of physical chemistry*, Nov. 1917, p.706. 1 p.

"Everything in it is...at least five years old...A valuable book for the student, however, even though it does not represent the knowledge of today." *Wilder D. Bancroft*.

*Science progress*, Oct. 1917, p.350. ½ p.

"As it stands, one is bound to notice a certain patchiness in the work, due to the elaboration of certain aspects of chemistry at the expense of others. In general, however, the book is fully up to the standard of previous editions, and the interesting account of Nernst's own researches almost makes up, perhaps, for the scanty treatment of other branches of chemistry." *Frederick A. Mason*.

**New York (city)—Health department.**

Monograph on the epidemic of poliomyelitis in New York city in 1916. 391 p. 1917. \$1.50.

*American journal of public health*, Sept. 1917, p.789. 2 col.

"Detailed historical description of the beginning of the 1916 epidemic...tracing its progress and enumerating the steps and measures taken in marshaling the forces of the department of health in the attempt to prevent the disease from spreading...Very complete and full report." *Stanley H. Osborne*.

**Newman, Horatio Hackett.**

Biology of twins. 185 p. 1917. Univ. of Chicago Press.

*Science*, Nov. 16, 1917, p.486. ¾ col.

"While the original papers are necessary for one seeking the details, the essential points obtained by these and other investigators to date have been placed in a single small volume where, appearing in a not too technical dress, they are readily and conveniently available not to zoologists alone, but to the thinking public in general."

**Northrup, Edwin F.**

Laws of physical science. 210 p. 1917. Lippincott, \$2.

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.819. ¼ col.

"Undoubtedly fills a gap in the reference literature of science."

*Sibley journal of engineering*, Sept. 1917, adv. sec. p.12. ¾ col.

"A 'hand book which contains a full list of the general propositions or laws of (physical) science,' arranged and classified by subjects so as to be readily available for quick reference for those whose work directly or indirectly brings them in touch with Physical Phenomena...Worthy of a place on the desk of every physicist, engineer, and chemist." *F. K. R.*

**Oberg, Erik, & Jones, F. D. ed.**

Machinery's encyclopedia. 7v. 3558 p. Industrial Press, \$36.

*Machinery*, Jan. 1918, p.480. ½ col.

"A work of reference covering practical mathematics and mechanics; machine design; machine construction and operation; electrical, gas, hydraulic and steam power machinery; metallurgy; and kindred subjects in the engineering field...Contains a vast amount of original matter published here for the first time...Illustrated with line engravings...The typographical appearance has been pronounced unusually good."

**Ocagne, Maurice d'.**

Cours de géométrie pure et appliquée de l'École Polytechnique. 375 p. 1917. Gauthier-Villars, Paris, 16 fr.

*Le Génie civil*, Aug. 11, 1917, p.100. ¾ col.

*Revue générale des sciences pures et appliquées*, Oct. 15, 1917, p.554. 1¼ col.

**Ombredanne, L. & Ledoux-Lebard, R.**

Localisation et extraction des projectiles. 348 p. 1917. Masson, Paris, 4 fr.

*Revue générale de l'électricité*, Aug. 11, 1917, p.202. 1½ col.

*Revue générale des sciences pures et appliquées*, Nov. 15, 1917, p.618. 2 col.

**Ontario—Royal nickel commission.**

Report, with appendix. 584 p. 1917. Wilgress.

*Analyst*, Nov. 1917, p.376. 1 p.

"A storehouse of information on all matters concerning the occurrence and distribution of nickel ores, the metallurgy of nickel, and the various industrial uses of the metal and its alloys and compounds... There is little doubt that it will form the standard work of reference on these subjects for a considerable time to come." *H. Louis*.

*Chemical news*, Nov. 9, 1917, p.233. ¼ col.

"Detailed account of the work of the Ontario Nickel Commission which was begun in September, 1915... The whole mass of evidence collected is contained in this report, which gives very full accounts of the early history of nickel mining in Ontario, the properties and uses of the metal, and alloys and compounds of which it is a constituent. Complete statistics are given of the output of all countries, costs of refining, and exports and imports, and a very exhaustive bibliography is provided."

*Journal of the Society of Chemical Industry*, Aug. 31, 1917, p.946. ¾ col.

"Is fully illustrated and forms a most valuable addition to the literature of the subject."

**Osborn, Henry Fairfield.**

Origin and evolution of life. 350 p. 1917. Scribner, \$3 net.

*Transactions of the American Microscopical Society*, Oct. 1917, p.282. 1½ p.

"Synthesizes the evolutions of astronomy, geology, physics, chemistry and biology... A beautiful and satisfying product of evolution, both in respect to its energy and its mechanical form."

**Owen, Margaret B.**

Secret of typewriting speed. 158 p. Forbes, \$1.

*Electric journal*, Nov. 1917, adv. sec. p.38. 9 l.

"Is by the world's champion typist and contains many good pointers."

*Inland printer*, Jan. 1918, p.531. ½ col.

"Is more than a book on speed... for it covers the whole subject of typewriting."

*Machinery*, Nov. 1917, p.282. 8 l.

"... By the world's champion typist... Embodies the principles of efficiency of action and the elimination of lost effort in typewriting."

*Scientific American*, Nov. 17, 1917, p.374. ¼ col.

"Pages abound in practical exercises and suggestions and there are supplementary chapters on secretarial work, office systems and the care of the eyes."

**Owens, Hubley R.**

Treatment of emergencies. Saunders, \$2.

*American journal of nursing*, Nov. 1917, p.173. 5 l.

"Many helpful procedures are recommended... Well illustrated."

**Packard, John C.**

Everyday physics; a laboratory manual. 142 p. 1917. Ginn, \$1.

*Scientific American*, Nov. 3, 1917, p.340. ¼ col.

"Has applications far wider than the secondary-school course in physics; its 61 studies include... familiar elements of everyday life."

**Pagé, Victor W.**

How to run an automobile. 178 p. 1917. Henley, \$1.

*Scientific American*, Oct. 20, 1917, p.303. ¼ col.

"The experience of the expert is here crystallized into practical lessons for the amateur. Automobile construction is outlined in one short chapter; after that the discussion is strictly confined to operation and care."

**Pagé, Victor W.**

Storage batteries simplified. 320 p. 1917. Henley, \$1.50.

*Scientific American*, Oct. 20, 1917, p.303. ¼ col.

"Comprehensive discussion of the action, maintenance, repair and use of that important accessory, the secondary battery."

**Pagé, Victor W. & Montariol, P.**

Glossary of aviation terms. 84 p. Henley, \$1.

*Gas engine*, Dec. 1917, p.614. ½ col.

"Admirably adapted to the purpose for which it is intended, and it is difficult to see how the arrangement could be bettered."

**Palmer, A. Risdon, & Stephenson, J.**

Commercial arithmetic and accounts. 2 pts. 514 p. pt.1, 1908; pt.2, n.d. G. Bell, 2s. 6d. each part.

*Nature*, Sept. 20, 1917, p.41. 1½ col.

"Written to meet the needs of that great and ever-increasing army of students which is receiving a thorough commercial training in our modern schools and colleges before entering upon a business career."

**Palotay, Julius A.**

Palotay's chemistry and general science chart. Author, Los Angeles, \$3.

*Journal of the American Chemical Society*, Dec. 1917, p.2756. 7 l.

"Consists of a table of the common elements with their physical constants and properties, confirmatory qualitative tests, etc.; miscellaneous anatomical and physiological data." *H. G. Deming*.

**Parke, Davis & Company.**

Collected papers from the research laboratory. v.4. p.343-550. 1916. The Company, Detroit.

*Pharmaceutical journal and pharmacist*, Sept. 1, 1917, p.98. ½ col.

"A valuable record of scientific work... This fourth volume demonstrates afresh that the research work carried on in Messrs. Parke, Davis' Research Laboratory is of the highest standard."

**Parker, Horatio N.**

City milk supply. 1917. McGraw, \$1.50 net.

*American journal of public health*, Sept. 1917, p.790. ¾ col.

"One of the valued features... is the bibliography... This particularly authoritative volume should be... highly appreciated by all who have to deal with the safeguarding and improvement of milk supplies." *Ivan C. Weld*.

**Parkes, Louis Coltwood, & Kenwood, H. R.**

Hygiene and public health. Ed.6. 787 p. 1917. Blakiston, \$4.

*American journal of public health*, Nov. 1917, p.966. 1 col.

**Parkhurst, Frederick A.**

Predetermination of true costs and relatively true selling prices. Wiley, 5s. 6d. net.

*Electrical review*, Nov. 2, 1917, p.431. ¾ col.

"Deals with the fundamental factors which govern the possibility of determining true costs, and his treatise is one of scientific commercial management and research." *J. C. P.*

*Times (London)*; *engineering supplement*, Oct. 26, 1917, p.219. ¾ col.

"Confined to what he has found to work in the foundry and the shops of machine builders... Has the advantage of being a transcript from actual verified practice, explained by a commentary that is itself plain and practical."



**Parkhurst, Frederick A.**

Symbols. 165 p. Wiley, \$2 net.

*Canadian engineer*, Oct. 25, 1917, p.368. 1 col.

"A sort of industrial esperanto, composed of combinations of letters and figures to represent objects, ideas and operations...Developed primarily for accounting, routing work, etc., in manufacturing establishments, but the principle is adaptable to nearly any purpose." *R. DeL. French*.

**Parsons, Carl C.**

Office organization and management. 313 p. 1917. La Salle Extension University, \$2.50.

*India rubber world*, Oct. 1917, p.28. ¼ col.

"Fills an important place in business literature because the office is the heart of every business institution...The importance of the human element is emphasized throughout, prevailing and exceptional customs being cited and much good advice offered."

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820. 4 l.

"A work treating of organization, management, layout, equipment, methods, systems, records, forms, employees, etc., and based on observation of the methods used in the offices of various large companies."

**Pattee, Alida Frances.**

Practical dietetics, with reference to diet in health and disease. Ed.II. 550 p. 1917. Author, Mount Vernon, N. Y., \$1.75.

*American food journal*, Nov. 1917, p.635. ¾ col.

**Patterson, Austin M. comp.**

German-English dictionary for chemists. 316 p. 1917. Wiley, \$2.

*Journal of physical chemistry*, Oct. 1917, p.608. ½ p.

"As the title is meant to imply, this book is not solely a dictionary of chemical terms. It includes words from related fields of science and, what is perhaps a novelty in a technical dictionary, a general vocabulary...The book is an admirable one and will be of great value to the student of chemistry." *Wilder D. Bancroft*.

*Nature*, Oct. 25, 1917, p.144. ¾ col.

"Not only is it a good general dictionary of the German language, but it contains also a very complete collection of chemical terms belonging both to the pure science and to technology."

*Science*, Oct. 26, 1917, p.414. 1½ col.

"Fulfills a need which probably every English-speaking worker in chemistry has experienced, and fulfils it admirably." *E. J. Crane*.

**Pauchet, V. and others.**

L'anesthésie régionale. Ed.2, rev. & enl. 261 p. 1917. Doin, Paris, 7 fr. 50.

*Revue générale des sciences pures et appliquées*, Aug. 15-31, 1917, p.479. ¾ col.

**Paul, George P.**

Text-book of materia medica for nurses. Ed.3. Saunders, \$1.50.

*American journal of nursing*, Jan. 1918, p.358. ¼ p.

"Whole text has been reviewed and many alterations made. Considerable new material has been added and the drug strengths have been corrected...We bespeak for this book a usefulness commensurate with the present day need of a text thoroughly reliable and dependable."

**Payne, David W.**

Founder's manual. 660 p. 1917. Van Nostrand, \$4.

*Electrical record*, Jan. 1918, p.82. ½ col.

"Information of handbook character rather than text book information is given."

*Iron and coal trades review*, Oct. 26, 1917, p.466. ¼ col.

"A presentation of modern foundry operations, and all matters in connection therewith."

*Journal of industrial and engineering chemistry*, Sept. 1917, p.917. ½ col.

"A compilation, the contents of which will be useful." *James O. Handy*.

**Payne, David W.**—*continued.*

*Railway mechanical engineer*, Sept. 1917, p.476. ½ col.

"In an effort to make the book of value to the novice...many pages of descriptive matter dealing with foundry equipment and practice have been added which will be of little interest to the experienced foundryman...The first seven chapters are devoted to mathematics, mechanics and a miscellaneous collection of engineering data...compiled from other authorities...Some of this information has little bearing upon foundry work in particular and probably will be of little use to the average reader."

*Times (London)*; *engineering supplement*, Nov. 30, 1917, p.239. ½ col.

"Conceived according to the modern type of engineer's pocket-book...Relates primarily, but not exclusively, to American practice...[Author] may be congratulated on having made a good start on a job that has not been attempted previously."

**Pearson, T. Gilbert, and others, ed.**

*Birds of America*. 3v. Univ. Soc., \$29.50. (Nature lovers' library.)

*American forestry*, Dec. 1917, p.761. ¾ col.

"As a contribution to the literature of America this is a notable work. The aim of its compilers was to present a complete review of the available knowledge concerning birds."

*Auk*, Jan. 1918, p.89. 2 p.

"By all odds the most thoroughly illustrated work on North American birds... Places within reach of the public a splendid series of bird pictures, more and better than can be gotten today in any other work...Text is admittedly, in the main, compiled, and most of the accounts are satisfactory, presenting concisely such information as one would desire on habits, range, food, etc." *W. S.*

**Pellet, Frank C.**

*Our back-door neighbors*. 209 p. Abingdon Press, \$1.50.

*Bird-lore*, Nov.-Dec. 1917, p.343. ½ col.

"Style is pleasing, unaffected, and sympathetic. His photographs illustrate his text and both are well designed to arouse us to the world which lies at our back door." *F. M. C.*

**Penman, David.**

*Compressed air practice in mining*. 221 p. 1917. Lippincott, \$1.75 net.

*Compressed air magazine*, Nov. 1917, p.8570. ½ col.

"Though normally designed for the use of students in mining schools and colleges it should appeal to all who are interested in the subject."

*Nature*, May 10, 1917, p.203. ¾ col.

"In its later parts is disappointing and does not bear out the promise of its early chapters, so that, altogether, it does not do justice to its title...Within these limitations, it is, however, clearly written."

*Scientific American*, Nov. 17, 1917, p.375. ½ col.

"States fundamental principles, compares air with other modes of transmitting power, and describes the various forms and makes of compressor."

**Pennsylvania University.**

*Illuminating engineering practice*; lectures delivered at the University of Pennsylvania, Sept. 1916, under the joint auspices of the university and the Illuminating Engineering Society. 578 p. 1917. McGraw, \$5.

*Illuminating engineer*, Sept. 1917, p.245; Oct. 1917, p.273. 10½ col.

"Contains a great deal of information on present practice...Arranged in orderly sequence, and there are many diagrams and illustrations...Text is presented on paper without shine, and the illustrations on mat art paper...At the conclusion...is an adequate index, and at the conclusion of some of the lectures are useful series of references."

**Perrett, Wilfrid.**

*Some questions of phonetic theory*. 110 p. 1916. University of London, 2s. 6d.

*Nature*, May 3, 1917, p.184. ½ col.

"Forms a notable contribution to the literature on the science of speech...We commend the work to the notice not only of those interested in the science of speech, but also of students of sound generally." *D. J.*

**Perrigo, Oscar E.**

Modern machine shop construction, equipment and management. Ed.2, rev. & enl. 384 p. Henley, \$5.

*American machinist*, Oct. 4, 1917, p.614. ½ col.

"Will be of interest to those desiring a general treatment of the subjects covered, but would have been more valuable had the revision been more thorough and the examples cited been brought up to date."

*Industrial management*, Oct. 1917, p.157. 8 l.

*Iron age*, Sept. 6, 1917, p.572. ⅝ col.

"The author has added four new chapters to bring the book up to date...Intensely practical...There is little or no underlying theory given showing the reason for the adoption of any particular method. The book, however, is a good one, as it outlines procedure which has succeeded...Particularly good for the young engineer and student."

*Iron trade review*, Dec. 13, 1917, p.1278. ¾ col.

**Perrin, Jean.**

Atoms. Ed.4, rev. and tr. by D. Ll. Hammick. 211 p. 1916. Constable, 6s. net.

*Electrician*, Oct. 19, 1917, p.84. ¾ col.

"Chapters I. and II. deal with Chemistry and the Atomic Theory, and with the Molecular Movements...Chapters III. and IV...deal with Brownian movements...Chapters V. to VIII deal with the fluctuations in density in the heart of a mass of gas or liquid, with chemical fluctuations, with light and quanta, with the atom of electricity, and with the genesis and destruction of atoms." *A. Griffiths*.

*Engineering*, Nov. 30, 1917, p.584. 2½ col.

"Whatever test be applied, the Sorbonne professor will not be found wanting. He has rendered a very distinct service to scientific education by presenting the results of recent physical inquiry in a form that is both interesting and exact. He has proved himself as able an exponent as he is a brilliant experimentalist."

*Engineering review*, Aug. 15, 1917, p.59. 1¾ col.

"A book most fascinating and valuable in itself and most difficult to review." *R. E. Neale*.

*Physical review*, Oct. 1917, p.412. ½ p.

"No other single book...gives such a comprehensive survey of this important field. Although necessarily concise, the treatment is by no means superficial." *E. P. L.*

**Petrunkevitch, A.**

Morphology of invertebrate types. 263 p. 1916. Macmillan.

*Science progress*, July 1917, p.174. ⅜ p.

"Designed for a course of practical work on invertebrate forms for use in the United States." *C. H. O'D.*

**Phillips, H. B.**

Differential calculus. 162 p. 1916. Wiley, 5s. 6d. net.

*Nature*, Nov. 1, 1917, p.163. ½ col.

"Should be stringently revised before it is put into a student's hands, and then its shortness might combine with accuracy towards making it a good text book."  $\emptyset$

*Science progress*, Oct. 1917, p.343. ⅔ p.

"There are certainly some advantages in the way in which the subject of the differential calculus is exposed in this book...But I hardly think that such advantages compensate fully for the decided disadvantages of carelessness and lack of logic." *Philip E. B. Jourdain*.

**Pickworth, C. N.**

Indicator handbook. pt.2. Ed.6. Emmot & Co., 3s. net.

*Engineering review*, Nov. 15, 1917, p.144. ½ col.

"Present edition differs only from the fifth in respect of a few minor revisions and by the addition in the appendix of a very useful table of mean pressure factors for ratios of expansion from 1 to 30 and for isothermal, saturation, and adiabatic conditions of expansion...Devoted to the analysis of the indicator diagram, horsepower calculations and so forth."



**Pickworth, C. N.**

Logarithms for beginners. Ed.6. Whittaker.

*Engineering review*, Aug. 15, 1917, p.59.  $\frac{1}{2}$  col.

"Anyone who is in search of a short and clear guide to the root principle of logarithmic calculation can scarcely do better than procure *Logarithms for Beginners*."

**Pitman's** dictionary of commercial correspondence (in seven languages). Ed.3, rev. & enl. Pitman, 7s. 6d. net.

*Iron and coal trades review*, Sept. 28, 1917, p.358.  $\frac{1}{2}$  col.

"Extremely useful book of reference by all who have to handle foreign correspondence."

**Planck, Max.**

Eight lectures on theoretical physics; tr. by A. P. Walls. 130 p. 1915. Columbia University Press.

*Science progress*, July 1917, p.162.  $\frac{1}{2}$  p.

**Pocock, Roger.**

Horses. 252 p. 1917. Murray, 5s. net.

*Science progress*, July 1917, p.179.  $\frac{5}{8}$  p.

"To Roger Pocock, the frontiersman, the history of the world is the history of the horse, with man as an adjunct. The effect is as interesting as it is unusual."

**Poorman, Alfred P.**

Applied mechanics. 240 p. 1917. McGraw, \$2.

*Engineering-education*, Oct. 1917, p.96.  $\frac{1}{2}$  p.

"Designed as a text for a class which completes its study of analytic mechanics in a single semester. . . . Covers the usual ground clearly, concisely, and completely." *W. R. W.*

**Popovatz, Paul.**

Notions générales sur les appareils à réaction. 36 p. 1916. Gauthier-Villars, Paris, 1 fr. 50.

*Journal of the Franklin Institute*, Dec. 1917, p.918.  $\frac{3}{4}$  col.

"A model of logical deduction of the principles of jet reaction and should prove a material aid in placing the design of propelling apparatus on a rational basis." *Lucien E. Picolet*.

**Porter, Charles.**

Elements of hygiene and public health. 411 p. 1917. Hodder & S., 12s. 6d.

*Journal of the Royal Sanitary Institute*, Oct. 1917, p.38. 1 p.

"As a handbook for the general practitioner, it must be regarded as of considerable value." *A. B. H.*

**Potter, Samuel O. L.**

Compend of materia medica, therapeutics and prescription writing, with especial reference to the physiological action of drugs. Ed.8, rev. by A. D. Bush. Blakiston, \$1.25 net.

*Saint Paul medical journal*, Oct. 1917, p.324. 61.

"Complete enough to be of value also for ready reference. . . . A first-class compend." *C. B. Drake*.

**Powell, Ola.**

Successful canning and preserving. 372 p. 1917. Lippincott, \$2 net. (Lippincott's home manuals.)

*American forestry*, Nov. 1917, p.696. 1 col.

"Of the new literature on the preservation of food products, none is more important than Miss Ola Powell's. . . . Her experience and research enable her to speak with authority and entitle her new book to a place among the classics of this branch of literature. . . . Devotes considerable space to the subject of teaching canning and kindred studies."

*Scientific American*, Dec. 1, 1917, p.431.  $\frac{1}{2}$  col.

"Sketches the development of scientific canning and its connection with bacteriology; preparation and equipment are very thoroughly illustrated."

**Price, William B. & Meade, R. K.**

Technical analysis of brass. Ed.2. 370 p. Wiley, \$3.

*Metal industry*, Oct. 1917, p.443.  $\frac{1}{4}$  col.

"Contains many changes which were based on helpful criticisms received after the publication of the first edition and an effort has been made to bring this particular edition up to date."

**Prideaux, E. B. R.**

Theory and use of indicators. 375 p. 1917. Constable, 12s. 6d. net.

*Chemical news*, Oct. 26, 1917, p.209.  $\frac{1}{3}$  col.

"The literature of Germany on the theory and use of indicators has been considerably more copious and detailed than our own on the same subject, and hence there is no doubt but a cordial welcome will await this book, which has drawn upon German treatises and monographs while adding very much valuable material."

**Pull, Ernest.**

Modern milling; a practical manual on milling machines, milling accessories and milling operations. Whittaker, 7s. 6d. net.

*Times (London)*; *engineering supplement*, June 29, 1917, p.139.  $\frac{2}{5}$  col.

"For those who know nothing at all about the milling machine...this volume will supply a reliable elementary text-book...But milling operators and practical machinists will be disappointed if they accept it at the face value of its title. They will find more help in the operating treatises that are issued by several manufacturing firms, and in a study of current technical literature."

**Pull, Ernest.**

Munition worker's handbook. 158 p. 1917. Lockwood, 2s. 6d. net.

*Engineering review*, Sept. 15, 1917, p.86.  $\frac{2}{3}$  col.

"Has various merits...Contains so much valuable...information, that the mannerism is of little account...Useful tables and a good index complete a very useful little book." *W. S. M.*

*Iron and coal trades review*, Nov. 16, 1917, p.552. 11 l.

"Contains practical information on workshop arithmetic, geometry, tools, lathe work, screw cutting, and general machine work."

*Practical engineer*, Aug. 30, 1917, p.103.  $\frac{1}{8}$  col.

"Advantage has been taken... to add chapters on milling machines and milling and on gear cutting, both of which are dealt with concisely, yet sufficiently exhaustively for the purpose. The second-named chapter contains a series of valuable tables, in which much information is given in a compressed form."

**Radasch, Henry Erdmann.**

Manual of anatomy. 1917. Saunders, \$3.50 net.

*Saint Paul medical journal*, Dec. 1917, p.382. 12 l.

"Written to fill the definite need in undergraduate work for a more concise text book...A moderate sized anatomy, not a compend." *Carl B. Drake.*

**Ramsay, Albert R. J. & Weston, H. C.**

Artificial dyestuffs; their nature, manufacture and uses. 212 p. 1917.

Routledge, 3s. 6d. net.

*Analyst*, Nov. 1917, p.378. 1 p.

"The preface declares the authors' aim to be providing the foundation of the necessary knowledge for an understanding of the industrial processes involved in the manufacture of synthetic colouring matters, but the chemistry of the subject is presented loosely and inaccurately." *M. O. Forster.*

*Chemical news*, Nov. 16, 1917, p.244.  $\frac{1}{3}$  col.

"Outline is given of the nature and uses of the chief classes of dyes...Provides a good foundation on the subject and an introduction to the study of larger works."

*Nature*, Nov. 29, 1917, p.242. 1 col.

"Chemical foundations are unsound. This detracts considerably from its utility as an introductory manual to the study of the artificial dye industry." *G. T. M.*

**Ramsay, J. Grant.**

One hundred points in food economy. 1917. G. Bell, 1s. net.

*Chemical news*, Aug. 10, 1917, p.72. ¼ col.

"Methods of economising in food are pointed out, the keynote of the text being 'Knowledge is necessary for real economy.'"

*Nature*, Sept. 6, 1917, p.3. 10 l.

**Ramsey, Walter R. and others.**

Care and feeding of infants and children; a text-book for trained nurses. 290 p. 1916. Lippincott, 9s. net. (Lippincott's nursing manuals.)

*Journal of the Royal Sanitary Institute*, Oct. 1917, sup. p.39. ¼ p.

"Thoroughly instructive and comprehensive manual for nurses written by an expert in the diseases of children." *L. C. P.*

**Reid, Charles B.**

Obstetrics for nurses. Mosby.

*American journal of nursing*, Jan. 1918, p.358. ¼ p.

"Author's apology for a new book on this subject is that he wishes to have a book presenting the matter in his own way."

**Remington, Joseph P.**

Practice of pharmacy. Ed.6. 1990 p. 1917. Lippincott, \$8; also in 2v., \$4.50 each.

*Druggists circular*, Jan. 1918, p.41. ¾ col.

"It is sufficient to say that the standard of excellence which its distinguished author set for himself a generation ago has been reached, not to say exceeded."

*Oil, paint and drug reporter*, Dec. 24, 1917, p.20. ½ col.

"While all the best features of the fifth edition are retained, many new departures have been made... While published in one volume for general use, this edition is also issued in two volumes for the use of students, the second volume beginning with inorganic chemicals."

**Reutter de Rosemont, L.**

Traité de chimie médo-pharmaceutique et toxicologique, avec commentaires du Codex et éléments thérapeutiques et physiologiques des principaux médicaments. 834 p. 1917. Doin, Paris, 15 fr. 40.

*Revue générale des sciences pures et appliquées*, Nov. 15, 1917, p.617. 1½ col.

**Re Vley, D. Gordon E.**

How to fly; a practical course of training in aviation. 110 p. 1917. Elder, \$1.

*Scientific American*, Dec. 22, 1917, p.488. 9 l.

"Brings together the essential facts of theory, control, rolling, hopping and the straightaway for learners, the turn, and the more difficult evolutions and landings... A useful glossary concludes a very clearly-worded, concise and authoritative treatise."

**Rey, Jean.**

The range of electric searchlight projectors; tr. by J. H. Johnson. 152 p. 1917. Van Nostrand, \$4.50.

*Electrical review (London)*; Aug. 17, 1917, p.167. 1½ col.

"The appearance of this book is particularly opportune, especially as no treatise has hitherto been available making it possible for artillery officers to calculate the range of searchlights."

*Electrical world*, Dec. 1, 1917, p.1062. ¾ col.

"Data are from recent practical investigations conducted on modern types of searchlights actually used in war."

*Electrician*, Oct. 9, 1917, p.87. ½ col.

*Illuminating engineer*, Aug. 1917, p.223. 1 col.

"Should prove extremely useful to artillery officers and others interested in the technical applications of searchlights, while to the illuminating engineer it presents an instructive example of the utility of the conception of flux of light."



**Richards, J. W.**

Metallurgical calculations. v.1. Ed.4, rev. & enl. 238 p. McGraw, \$2.

*Metallurgical and chemical engineering*, Jan. 1, 1918, p.45.  $\frac{1}{3}$  col.

"Since the first edition of this work was published, in 1906, it has become so widely used and known that further cataloging of its contents is unnecessary excepting a notation of the improvements in this last edition...Should...be much more valuable to the metallurgist and engineer than the preceding editions."

**Richardson, O. W.**

The emission of electricity from hot bodies. 304 p. Longmans, \$2.75 net.

*Sibley journal of engineering*, Nov. 1917, adv. sec., p.27.  $\frac{1}{2}$  col.

"Covers the subject distinctly from the standpoint of the physicist, but is written in such a manner as to be acceptable to the reader whose viewpoint is other than that of pure physics." *W. C. B.*

**Richardson, R. P. & Landis, E. H.**

Fundamental conceptions of modern mathematics; variables and quantities, with a discussion of the general conception of functional relations. 216 p. 1916. Open Ct., \$1.25 net.

*Nature*, Nov. 1, 1917, p.162.  $\frac{1}{2}$  col.

"Cannot be said to be a useful contribution to our knowledge of the fundamental conceptions of mathematics."  $\emptyset$ .

**Rickard, Thomas Arthur, & Ralston, O. C.**

Flotation. 420 p. 1917. Mining and Scientific Press, \$3.

*Mining magazine*, Nov. 1917, p.247.  $\frac{1}{3}$  col.

"There are many investigators of flotation throughout the world who eagerly absorb all the available information and who will therefore thank Mr. Rickard for issuing this book."

*Scientific American*, Dec. 15, 1917, p.468.  $\frac{1}{4}$  col.

"Deals with flotation processes in metallurgy and the physical principles upon which they rely...Most of the volume is devoted to...recent development."

**Ries, Heinrich.**

Economic geology. Ed.4, rev. 856 p. Wiley.

*Science*, Nov. 16, 1917, p.488.  $1\frac{1}{2}$  col.

"Primarily a text-book, yet the summaries of different theories as to ore deposits... often largely based upon original studies, are so valuable that no one interested in its field can afford to be without the book." *Alfred C. Lane*.

*Science progress*, July 1917, p.169.  $\frac{5}{8}$  p.

"Its scope is still largely confined to the United States...A compilation rather than a philosophical treatise on applied geology...Will be very useful as a reference work for student and specialist alike." *G. W. T.*

**Robbins, Wilfred W.**

Botany of crop plants. Blakiston, \$2.

*American forestry*, Nov. 1917, p.695.  $\frac{1}{2}$  col.

"Intended as both text and reference book."

**Robinson, Ernest F.**

Military preparedness and the engineer; a handbook for the civilian engineer. Ed.2. 361 p. 1917. Clark Bk. Co. Inc., \$2 net.

*Journal of the American Society of Mechanical Engineers*, Nov. 1917, p.976.  $\frac{1}{3}$  col.

"For the information of civilian engineers desirous of serving their country in the field in time of war...Brought down to date by the inclusion of new material from many different sources."

**Roddy, John A.**

Medical bacteriology. Blakiston, \$2.50.

*Journal of the American Pharmaceutical Association*, Dec. 1917, p.1119.  $2\frac{1}{2}$  col.

"A text book for beginners and a laboratory guide for medical practitioners and pharmacists, presented in the clearest possible form." *F. E. S.*

**Rodenhauser, Wilhelm, and others.**

Electric furnaces in the iron and steel industry. Ed.2, rev. & enl. 429 p. Wiley, \$3.75.

*Iron age*, Nov. 29, 1917, p.1334. 1 col.

"A book containing up-to-date theoretical and practical information...Answers a real necessity and will be warmly welcomed...Adequately meets every present demand and is as modern in its data as it is possible for a book to be."

**Rodet, J.**

Actions physiologiques et dangers des courants électriques. 88 p. 1917. Gauthier-Villars, Paris, 3 fr. 25.

*Bulletin de la Société Internationale des Electriciens*, Aug.-Oct. 1917, p.256. ½ p.

*Electrician*, Dec. 7, 1917, p.342. ¼ col.

"A most readable book full of information certain to prove most helpful." *C. P.*

*Nature*, Sept. 13, 1917, p.24. 2½ col.

"Written with the usual lucidity of French scientific works and should be in the hands of everyone likely to have to deal with the results of exposure to electrical currents." *W. M. Bayliss.*

**Rogers, Allen.**

Laboratory guide of industrial chemistry. 212 p. Van Nostrand, \$2.

*Metallurgical and chemical engineering*, Jan. 1, 1917, p.46. ½ col.

**Rose, E. Mortimer.**

Diesel engine design. 203 p. 1917. Emmott, \$1.50 net.

*Canadian engineer*, Nov. 29, 1917, p.463. ½ col.

"Extremely well adapted to the requirements of the operating engineer and station manager, to whom a somewhat detailed knowledge of the apparatus in his charge is essential." *H. H. Williams.*

*Engineering review*, Nov. 15, 1917, p.142. 1½ col.

"The treatment given is sufficiently detailed and carried far enough to make the book of real value to the practising engineer, and there is no excessive quantity of mathematical work or purely theoretical discussion." *R. E. Neale.*

*Iron and coal trades review*, Oct. 26, 1917, p.466. ¾ col.

"To correlate information with a view to rendering assistance to engineers, draughtsmen, and others."

*Model engineer and electrician*, Nov. 1, 1917, p.280. ¾ col.

*Times (London); engineering supplement*, Nov. 30, 1917, p.239. 4/5 col.

"Deals with the pure-science or academic side of the subject...and, what is more important still, with the practical side, a very full description being given of existing engines, and also of difficulties that have arisen in past practice. The author's crisp and concise style...has enabled him to put a very large amount of useful information into a reasonable compass, and he provides an excellent set of tables useful to designers."

**Rose, Mary Swartz.**

Feeding the family. Macmillan, \$2.

*American forestry*, Nov. 1917, p.696. ¼ col.

"Subject is treated clearly and concisely, in plain language...Has a value for every housekeeper."

**Rosenau, Milton J.**

Preventive medicine and hygiene. Ed.3. 1917. Appleton, \$6.50.

*American journal of public health*, Dec. 1917, p.1052. ¾ col.

"Might be called a 'special' or military edition for it has been prepared to meet the needs of the present emergency...Author has admirably succeeded in condensing a large amount of useful material, and in doing so has apparently utilized the most recent sources of information available...Remains, as before, the most useful single work on the subject." *Charles F. Bolduan.*

*Saint Paul medical journal*, Oct. 1917, p.324. 10 l.

"Contains a store of information particularly valuable to the physician or worker interested in health departments, schools, and in other matters pertaining to municipal prevention or regulation of disease." *Carl B. Drake.*

**Rothé, E.**

Cours de physique professé à la Faculté des sciences de Nancy.  
3v. 1917. Gauthier-Villars, Paris.

v.1. Généralités, unités, similitude, mesures. 1914. 184 p. 6 fr. 50.

v.2. Thermodynamique. 1917. 328 p. 13 fr.

*Revue générale de chimie pure et appliquée*, Jan.-Feb. 1917, p.14, (review of v.1-2).  
2½ col.

*Revue générale des sciences pures et appliquées*, Oct. 15, 1917, p.554, (review of v.2).  
2½ col.

**Ruggles, Colden L'H.**

Stresses in wire-wrapped guns and in gun-carriages. Ed.2. 259 p.  
1916. Wiley, 13s. 6d. net.

*Nature*, Nov. 22, 1917, p.221. 2 col.

"A work which contains so much information about U. S. ordnance, even if not the absolutely latest patterns, and the methods employed by U. S. ordnance experts will naturally appeal to an unusually wide circle at present."

**Running, Theodore R.**

Empirical formulas. 144 p. 1917. Wiley, \$1.40.

*Canadian engineer*, Nov. 29, 1917, p.462. 5½ col.

"Should be found of value by those desiring to make up empirical formulas in given cases." *R. W. Angus*.

*Engineering news-record*, Nov. 15, 1917, p.940. ¼ col.

"Although it is of the highest mathematical elaboration, it is quite easily comprehended by anyone who has had the usual college engineering training in the subject."

*Journal of the American Society of Mechanical Engineers*, Jan. 1918, p.118. 1½ col.

"Nineteenth volume of the series of Mathematical Monographs edited by Mansfield Merriman and Robert S. Woodward...The most complete treatise on the subject ever published and the first book worthy of the title...A practical book and should be particularly valuable to engineers engaged in research, design, time study, estimating costs, testing and any other work involving the use of tabular values derived from experimental or other observed data." *A. Lewis Jenkins*.

*Metallurgical and chemical engineering*, Nov. 15, 1917, p.612. ½ col.

"Sufficiently elementary to be within the capabilities of anyone who can use the calculus."

**Russell, E. S.**

Form and function; a contribution to the history of animal morphology. 383 p. 1916. Murray, 10s. 6d. net.

*Science progress*, July 1917, p.173. 1 p.

"Is a much-needed and well-written addition to morphological literature. No similar work is available to the English reader." *C. H. O'D.*

**Russell, Edward J.**

Soil conditions and plant growth. Ed.3. 243 p. Longmans, 6s. 6d. net.

*Chemical news*, Sept. 14, 1917, p.138. ½ col.

"Valuable both from the practical and theoretical points of view...[Author] has added much material to the science, and...has admirably summarised, criticised, and explained practically all the work that has been done here, in America, and on the Continent...The excellent bibliography has been brought up to date."

**Sackur, Otto.**

Text-book of thermo-chemistry and thermodynamics; tr. and rev. by G. E. Gibson. 439 p. 1917. Macmillan, \$3.50.

*Journal of physical chemistry*, Nov. 1917, p.707. 1 p.

*Science progress*, July 1917, p.164. 5½ p.

"Perhaps the most striking feature of the book is its clearness...Prof. Sackur does not hesitate to bring the reader into early contact with some of the most recent advances in physico-chemical thinking, but the matter is put in an exceedingly lucid way." *W. C. McC. Lewis*.



**Sanderson, E. Dwight, & Peairs, L. M.**

School entomology; an elementary textbook of entomology for secondary schools and agricultural short courses. 356 p. 1917. Wiley, \$1.50.

*Journal of economic entomology*, Oct. 1917, p.507. ¼ p.

"An excellent discussion of the systematic and economic phases of entomology admirably adapted to the needs of agricultural and secondary students in particular...A very meritorious work which will be greatly appreciated by teachers and students."

**Sargeant, E. W.**

Centrifugal pumps and suction dredgers. 1916. C. Griffin, 10s. 6d. net.

*Engineering*, Aug. 24, 1917, p.208. 1¼ col.

"Provides a valuable discussion of the practical and commercial side of centrifugal pump manufacture, and supplies a very simple basis for a 'drawing-office' method of design."

**Schimpf, Henry W.**

Essentials of volumetric analysis. Ed.3. rewritten and enl. Wiley, \$1.60 net.

*Oil, paint and drug reporter*, Dec. 24, 1917, p.20. ½ col.

"Planned to meet the needs of students, presenting in concise form a practical guide to volumetric analysis. It is well illustrated and contains many valuable tables."

**Schimpf, Henry W.**

Systematic course of qualitative chemical analysis, of inorganic and organic substances. Ed.3. rev. 187 p. 1917. Wiley, \$1.50.

*Druggists circular*, Jan. 1918, p.42. ½ col.

"Treated...from the standpoint of the requirements most essential for the student of pharmacy...The valuable features of former editions are retained, and much new matter added. Many charts are introduced which will be found most useful by the student."

*Journal of the American Pharmaceutical Association*, Dec. 1917, p.1119. 1 col.

"About the same as the previous editions in scope and arrangement. It has been amplified and extended, however, in a number of directions, having a number of new separation schemes or charts...Is commendable, either looked upon as a text book or a laboratory reference book." C. H. L.

**Schuster, A. & Lees, C. H.**

Exercises in practical physics. Ed.4, rev. 379 p. Cambridge University Press, 7s. net.

*Science progress*, July 1917, p.163. ¾ p.

"Students who have already obtained an elementary knowledge of physics will find in this book an excellent guide to the principles and methods of accurate measurement. The instructions are complete." J. Rice.

**Sclater, William Lutley, ed.**

Index of genera and species referred to, and an index to the plates in "The Ibis" (seventh, eighth, and ninth series), 1895-1912. 513 p. British Ornithologists' Union, £1 12s. 6d.

*Nature*, March 1, 1917, p.4. ½ col.

**Scott, Wilfred Welday, ed.**

Standard methods of chemical analysis; a manual of analytical methods and general reference for the analytical chemist and for the advanced student. 864 p. 1917. Van Nostrand, \$6 net.

*Journal of industrial and engineering chemistry*, Sept. 1917, p.917. 1½ col.

"Aim...is to give carefully selected methods of technical analysis in sufficient detail to enable one with only an elementary knowledge of chemistry to follow the directions." William T. Hall.

**Searle, A. B.**

Refractory materials; their manufacture and uses. 444 p. C. Griffin, 15s. net.

*Brick and pottery trades journal*, Oct. 1, 1917, p.218. 1 $\frac{2}{3}$  col.

"Purpose. . . is to summarise, in convenient form, the chief materials and products used in the construction of furnaces, etc., and to describe the manufacture and properties of fire bricks, retorts, crucibles, etc., used in the metallurgical, engineering, chemical and other industries. . . Besides appealing strongly to manufacturers of refractory materials, it should also serve as a handy reference book for steel manufacturers and all other firms who use these materials in the form of bricks, blocks, crucibles, etc."

*Ironmonger*, Dec. 29, 1917, p.50.  $\frac{2}{3}$  col.

"The first impression that this work makes on the reviewer's mind is the wide field of industrial operations into which refractories enter."

**Seward, A. C.**

Fossil plants; a textbook for students of botany and geology. v.3. 656 p. 1917. Cambridge University Press, 18s. net.

*Geological magazine*, Nov. 1917, p.516. 2 p.

"Continuation of his systematic account of fossil plants, taken up from the end of vol.2, which appeared in 1910." *A. B. Rendle*.

*Museums journal*, Sept. 1917, p.46. 4 l.

"The two volumes previously issued have sufficiently proved the value of this work to all in charge of collections of fossil plants. The account of seeds in the present volume will be particularly welcomed."

**Seward, A. C. ed.**

Science and the nation; essays by Cambridge graduates. 328 p. 1917. Cambridge University Press, 5s. net.

*Engineering review*, Aug. 15, 1917, p.39. 2 p.

"It would be an excellent thing if every Member of Parliament, every administrative and civil servant, every educational authority, and every publicist were compelled to study this book. . . Valuable not only for the information it conveys but also, and in a still higher degree, for the vision it affords of the scope and meaning of science."

*Revue générale des sciences pures et appliquées*, Oct. 31, 1917, p.588.  $\frac{2}{3}$  col.

**Shattuck, George Cheever.**

Principles of medical treatment. Ed.3, rev. & enl. 1916. Leonard, \$1.50.

*American journal of nursing*, Sept. 1917, p.1243. 6 l.

"Doctor Shattuck has treated an intricate subject in an original manner, which is especially notable when the extreme brevity of the work is considered."

**Shaw, Thomas R.**

Precision grinding machines. 214 p. Scott, Greenwood, 10s. 6d. net.

*Ironmonger*, Dec. 29, 1917, p.50.  $\frac{1}{2}$  col.

**Sheldon, Samuel, & Hausmann, Erich.**

Physical laboratory experiments for engineering students. 134 p. 1917. Van Nostrand, \$1.25 net.

*Physical review*, Oct. 1917, p.414.  $\frac{1}{4}$  p.

"Especially adapted for a laboratory course for students who have had some previous knowledge of physics and mathematics including the calculus." *E. J.*

*Sibley journal of engineering*, Sept. 1917, p.300.  $\frac{1}{4}$  col.

"These thirty laboratory exercises in Mechanics, Sound, Heat and Light are designed for engineering students who have had laboratory exercises in high schools. . . The ground covered is thoroughly treated. . . The directions are explicit and the results should instill confidence in the apparatus, confidence in the theory, and confidence in the operator."

**Shelford, R. W. C.**

A naturalist in Borneo; ed. by E. B. Poulton. 331 p. 1916. T. F. Unwin, 15s. net.

*Science progress*, July 1917, p.174. ½ p.

"The book is a very interesting one and gives a vivid account of the many sides of animal life in a very rich region, by one who was both a keen observer and naturalist." C. H. O'D.

**Shepard, George H.**

The application of efficiency principles. 368 p. Eng. Mag., \$3.

*American machinist*, Oct. 4, 1917, p.614. ¾ col.

"Deals with the application rather than the statement of principles, but gives a general a treatment of application as can be made concrete and practical...Written by an author who knows his subject, and it should be in the hands of those who desire to transform ideal efficiency principles into practical working means."

*Industrial management*, Nov. 1917, p.269. 6½ col.

"The reader who is already acquainted with modern industrial methods will find many suggestions of value...A distinct addition to efficiency literature."

*Iron age*, Nov. 29, 1917, p.1334. 1 col.

"Whether or not the author has succeeded in accomplishing his object of making more clear the application of Mr. [Harrington] Emerson's principles is an open question...If however, the author has endeavored to show that the principles of efficiency are of universal application, he has succeeded admirably...Contains much that is good, and can be read with profit by manufacturers and business men in general." R. K.

*Machinery*, Oct. 1917, p.186. 1-7 col.

"Deals with the principles of job analysis, piece rates, application of common sense to job analysis, the value of ideals in an industrial organization, and the importance of hiring the right men for the right place."

**Shepardson, George Defrees.**

Telephone apparatus. 337 p. 1917. Appleton, \$3.

*Electrical review*, Nov. 10, 1917, p.822. ½ col.

"An extended treatment of the basic physical principles of telephone apparatus... Occupies a field which has not heretofore been satisfactorily covered." C. M. Jansky.

*Physical review*, Oct. 1917, p.412. ½ p.

"Written to supply the need for a systematic historical and theoretical treatment of the subject...Useful not only to the telephone engineer, but to the physicist who wishes to keep in touch with the applications of his science." E. P. L.

*Science*, Nov. 9, 1917, p.462. 1 col.

"A noteworthy feature...is the large number of collateral references...This subordinate material makes the work of great value as a reference book to telephonists and students of telephony. Probably no other text-book on telephony in the English language contains such a wealth of electro-technical reference material." A. E. K.

**Sherman, Henry C.**

Chemistry of food and nutrition. Macmillan, \$1.50.

*American forestry*, Nov. 1917, p.696. ½ col.

"Especially useful to the general reader...Also embodies material that should be of value to teachers and students."

**Shiple, Arthur Everett.**

Studies in insect life, and other essays. 338 p. 1917. T. F. Unwin, 10s. 6d. net.

*Science progress*, Oct. 1917, p.356. ½ p.

"The subjects are ably treated, and the lucid and fascinating style of the author will render the perusal of these essays a real enjoyment." H. F. C.

**Simmons, William H.**

Soap. 124 p. Pitman, 2s. net.

*Chemical news*, Oct. 19, 1917, p.197. ½ col.

"Although a certain amount of scientific knowledge would be necessary to understand thoroughly the text of this book...technicalities are avoided...very successfully, and a subject of considerable interest is treated in such a way that the general public would be quite likely to find entertainment as well as instruction in the text."



**Simon, W. & Base, Daniel.**

Manual of chemistry. Ed.11. 648 p. 1917. Baillière, 18s. net.

*Pharmaceutical journal and pharmacist*, Sept. 8, 1917, p.110. ½ col.

"Beautifully produced, paper and print being of the best, while the coloured reaction plates will assuredly be a help to some readers."

**Smith, Charles Marquis.**

Electric and magnetic measurements. 367 p. Macmillan, \$2.40.

*Electrical record*, Dec. 1917, p.82. 9 l.

"Should be a useful reference to testing engineers in connection with laboratories and central station work."

**Smith, Frank W. & Cushing, H. C. jr.**

Electric vehicle handbook. 388 p. H. C. Cushing, jr., New York, \$2.

*Electrical world*, Jan. 5, 1918, p.50. 11 l.

"The only book on the subject...and has proved a valuable reference work for the owner or operator of an electric vehicle of any class."

**Smithies, Frank.**

Cancer of the stomach. 1916. Saunders, \$5.50 net.

*Saint Paul medical journal*, Nov. 1917, p.350. ½ p.

"Contains a wealth of information on this interesting and important subject." *J. S. Gilfillan*.

**Smoley, Constantine K.**

Parallel tables of slopes and rises. 345 p. 1917. McGraw, \$4 net.

*Canadian engineer*, Oct. 25, 1917, p.369. 1 col.

"Usefulness...is self-evident from its title page...Any engineer who has had much to do with calculations, in which levels enter...will value this book highly." *M. B. Atkinson*.

**Snow, Charles H.**

Wood and other organic structural materials. McGraw, \$5.

*American forestry*, Nov. 1917, p.695. ¼ col.

"For engineers, architects, students of technology, teachers of manual training and those who use structural materials...Among those [materials] considered are woods, paints and varnishes—with their associated oils, pigments, gums and resins—glues, creosotes and India rubber...Is comprehensive...[Author] has given exhaustive study to his subject and has provided a vast amount of information of value."

**Snyder, Harry.**

Human foods and their nutritive value. Macmillan, \$1.25.

*American forestry*, Nov. 1917, p.696. ½ col.

"Professor Snyder...shows a clear understanding of food values and sets them forth in style well adapted for use of the work of a text-book for students in colleges."

**Soddy, F.**

La chimie des elements radioactifs. 174 p. 1916. Gauthier-Villars, Paris, 5 fr.

*Physical review*, Nov. 1917, p.589. 4 l.

"Excellent translation...An improvement on the original has been made by putting references in footnotes instead of at the end of the volume." *E. P. L.*

**Soper, George A. and others.**

Report on the disposal of sewage and the protection of the water supply of Chicago, U. S. 212 p. 1915.

*Journal of the Royal Sanitary Institute*, Oct. 1917, p.37. ¾ p.

**Spangler, H. W.**

Graphics. 95 p. Wiley, \$1.25 net.

*Canadian engineer*, Dec. 27, 1917, p.536. ¼ col.

"Aim...is to provide students in mechanical and structural engineering with a treatise on the fundamental principles in graphic statics...Printed in a good clear type with

**Spangler, H. W.—continued.**

a great many diagrams which, by illustrating the text, are of great assistance to the reader." *W. J. Smither.*

*Engineering news-record*, Dec. 20, 1917, p.1169.  $\frac{3}{4}$  col.

"A collection of notes of lectures as presented for many years by the late Dr. Spangler to his students at the University of Pennsylvania... Well presented by the publishers and should meet with approval in the limited field of its application to the needs of students." *J. P. J. Williams.*

*Machinery*, Nov. 1917, p.282. 10 l.

"Intended to cover only fundamental principles."

**Spétebroot, Henri.**

Traité de la teinture moderne. 641 p. 1917. Dunod & Pinat, Paris, 25 fr.

*Bulletin de la Société d'Encouragement*, May-June 1917, p.628.  $1\frac{1}{2}$  p.

*Moniteur scientifique*, Oct. 1917, sup., p.71.  $\frac{3}{8}$  col.

*Revue générale de chimie pure et appliquée*, Jan.-Feb. 1917, p.15. 1 col.

*Revue générale des sciences pures et appliquées*, Sept. 15-30, 1917, p.521. 1 col.

**Sprague, E. H.**

Strength of structural materials. 202 p. Scott, Greenwood, 4s. net. (Broadway engineering handbooks.)

*Ironmonger*, Dec. 29, 1917, p.50.  $\frac{1}{3}$  col.

"Textbook for students written from the teacher's point of view, and each stage in the development of the subject is carefully explained and the lesson driven home by problematical examples of a definite and practical character, for which an answer is provided to enable the student to verify his calculations."

**Spratt, Charles E.** See Directory of the furniture manufacturers of the United States.

**Spring, La Verne W.**

Non-technical chats on iron and steel. 358 p. Stokes, \$2.50 net.

*Iron trade review*, Dec. 13, 1917, p.1276. 1 col.

"Subject matter is couched in a simple and effective style. A happy medium is struck between irksome, technical detail and unstudied, instructive fact... Excellent book for anyone seeking an every-day working knowledge of the iron and steel industry."

**Spurrell, H. G. F.**

Modern man and his forerunners; a short study of the human species, living and extinct. 192 p. 1917. G. Bell, 7s. 6d. net.

*Nature*, Sept. 6, 1917, p.4. 1 col.

"The very best parts... are those in which he records his studies of the habits and psychology of apes and monkeys. His interests, however, are centered... on those mental characters which come into action when individuals become grouped in herds and communities."

**Stanley, F. C.**

Talks to platers. 82 p. Bridgeport Branch of Am. Electroplaters' Society, \$.50.

*Journal of industrial and engineering chemistry*, Dec. 1917, p.1157.  $\frac{3}{4}$  col.

"Explanation of the principles of chemistry and... description of methods for the analysis of various plating solutions, in which in general the chemical principles are so simply and clearly stated that with some practice the platers should have no difficulty in obtaining approximate results." *William Blum.*

**Stebbing, Edward Percy.**

British forestry; its present position and outlook after the war. 258 p. 1916. Murray.

*Journal of forestry*, Dec. 1917, p.1021. 2 p.

"A stirring and convincing argument for better forestry in Great Britain." *J. W. T.*

**Stecher, William A.**

Theory and practice of educational gymnastics for boy's and girl's high schools. 104 p. McVey, \$1.25 net.

*Mind and body*, Nov. 1917, p.340. ½ p.

"Will prove a great help to the teacher in preparing his lesson and to proceed step by step from the easy to the more difficult exercises and from the accomplished or mastered to the material yet to be learned."

**Steel, Matthew.**

Laboratory manual of organic chemistry for medical students. 193 p. 1916. Chapman & H., 6s. net.

*Pharmaceutical journal and pharmacist*, Nov. 10, 1917, p.223. ⅓ col.

**Steele, J. E.**

Naval architecture. pt.I. Cambridge University Press, 5s. net.

*Times (London)*; *engineering supplement*, Oct. 26, 1917, p.219. ⅔ col.

"To the elementary student the volume will be found of real service in indicating the general idea of merchant ship construction and in providing an introduction to the simpler calculations."

**Steinmetz, Charles Proteus.**

Theory and calculations of electrical apparatus. 480 p. McGraw, \$4.

*Electric journal*, Dec. 1917, adv. sec., p.36. 13 l.

"Long discussions are given on induction motors, single phase motors, and alternating-current motors in general."

*Electrical review (Chicago)*, Dec. 22, 1917, p.1074. 1 col.

"Devoted to apparatus, rather than phenomena or circuits, this is one of the three volumes which have sprung from the single volume which Dr. Steinmetz presented twenty years ago as his 'Theory and Calculation of Alternating-Current Phenomena...Being intended for advanced students, this book assumes the reader to be familiar with the general arrangement of a considerable part of the apparatus here discussed...If this greatly enlarged revision were as readable, as logically arranged, and as well indexed as its predecessor of twenty years ago, it should rank as a masterpiece.'" *Albert Scheible*.

**Still, Alfred.**

Principles of electrical design; direct and alternating current generators. 365 p. 1917. McGraw, \$3 net.

*Engineering-education*, Nov. 1917, p.134. ⅓ p.

"Primarily for the electrical engineering student, and not intended as a reference book for the finished designer." *H. E. D.*

**Stone, I. F. comp.**

Aniline color, dyestuff and chemical conditions from August 1, 1914 to April 1, 1917. 224 p. 1917. National Aniline and Chemical Co., New York.

*Journal of industrial and engineering chemistry*, Dec. 1917, p.1158. ⅓ col.

"A series of addresses and articles compiled by Mr. Stone...A very welcome and successful attempt to put into permanent form the literature relating to the development of the American Dyestuff Industry...Will prove a valuable and useful reference book." *J. Merritt Matthews*.

*Journal of the Franklin Institute*, Sept. 1917, p.454. 1 p.

"A valuable contribution to the problem of establishing the tar industries in this country upon a basis which will prevent their being upset by competition from any other country." *Henry Leffmann*.

*Upholsterer and interior decorator*, Sept. 15, 1917, p.77. 1 col.

"Of historical and statistical value and...represents an interesting addition to literature on the dyestuff situation."

**Storey, E. W.**

Monthly cost accounting for varnish plants. National Varnish Manufacturers' Association, \$1.25.

*Oil, paint and drug reporter*, Nov. 5, 1917, p.20. 10 l.

"Will be found of unusual interest and value...Goes deeply into the matter of detailed records, and includes charts and accounting forms."



**Stout, William B.**

Acquiring wings. 57 p. Moffat, \$75.

*Aviation*, Nov. 1, 1917, p.461. 10 l.

"Should prove a valuable introductory guide to all those who are taking up the study of aviation."

**Strouse, Solomon, & Perry, M. A.**

Food for the sick. Saunders, \$1.50.

*American journal of nursing*, Jan. 1918, p.358. ½ p.

"An old subject presented in a new way. The authors not only give excellent menus but, in an attractive way, the reason for the diet is explained, so that anyone may intelligently follow the instructions. . . . Would seem to be a book useful to many."

**Struthers, Lina Rogers.**

The school nurse; a survey of the duties and responsibilities of the nurse in the maintenance of health and physical perfection and the prevention of disease among school children. Putnam, \$1.75.

*American journal of nursing*, Nov. 1917, p.172. 1 p.

"Many illustrations enhance the value of the volume and make it especially attractive. Everyone interested in the advancement of Public Health Nursing will find this book an intelligent and authoritative reference for this branch of the work."

**Strutt, E. G. and others.**

British agriculture, the nation's opportunity; being the minority report of the Departmental committee on the employment of sailors and soldiers on the land. 168 p. 1917. Murray, 3s. 6d. net.

*Nature*, March 1, 1917, p.3. 1½ col.

**Stubbs buyers' directory for the wholesale drug, chemical and allied trades.** 372 p. Alfred Stubbs, New York, \$3.

*India rubber world*, Oct. 1917, p.28. 8 l.

"This well-arranged directory is an authoritative guide for buying the many materials handled by the trades mentioned."

**Taggart, W. Scott.**

Cotton spinning. v.3. Ed.4. 462 p. 1916. Macmillan, 10s. net.

*Nature*, Aug. 9, 1917, p.462. ½ col.

"The descriptions of the various pieces of mechanism are clear and adequate, and the scheme of the work is based upon the regular sequence of the movements dealt with. Vol.iii is devoted to mule and ring spinning, to winding, doubling, reeling, gassing, bundling, mill planning, and humidity."

**Taylor, Frederick Winslow.**

La taille des métaux; tr. by L. Descroix. 296 p. 1917. Dunod & Pinat, Paris, 16 fr.

*Bulletin de la Société d'Encouragement*, July.-Aug. 1917, p.155. 2 p.

**Taylor, Frederick Winslow, & Thompson, S. E.**

Treatise on concrete, plain and reinforced. Ed.3. 885 p. Wiley, 23s. net.

*Concrete and constructional engineering*, Oct. 1917, p.581; Nov. 1917, p.643. 4½ p.

"Holds a very high place in the literature of concrete engineering, and deserves more than a passing notice. . . . As a whole is excellent and is almost indispensable to all who deal literally in concrete matters. . . . Is. . . . for men actually engaged in the design and execution of concrete work." *Ewart S. Andrews.*

*Engineering review*, Sept. 15, 1917, p.86. ½ col.

"Covers such an extensive ground that it is impossible to give a detailed notice and criticism within a short space. . . . We can give the book no greater praise than by describing the treatment as being scientific without being pedantic, and practical without being empirical." *E. S. A.*

*Times (London)*; *engineering supplement*, Sept. 28, 1917, p.199. ¾ col.

"Leading experts in all branches of the subject have lent assistance, and in some respects the book is encyclopædic in its methods. . . . The graphic diagrams are abundant

**Taylor, Frederick Winslow, & Thompson, S. E.**—*continued.*

and are selected with great judgment... Authors have added to the value of their work by giving a well-arranged set of references... Index is good."

**Taylor, G. S.**

Memorandum on chains and other lifting appliance [s]? 50 p. T. F. Unwin.

*Canadian engineer*, Nov. 29, 1917, p.461. 1½ col.

"Compiled with a view to the prevention of accident[s] and to minimize danger... Of great value in connection with the 'safety first' movement." *A. L. Haas.*

**Taylor, J. L. B.**

Handbook for rangers and woodsmen. 420 p. 1917. Wiley, 11s. 6d. net.

*Nature*, Sept. 20, 1917, p.44. ¾ col.

"Handbook of pocket size, primarily intended as a vade-mecum on all subjects that may turn up in the course of the multifarious activities of the forest ranger or woodsman in the United States."

**Taylor, William T. & Braymer, D. H.**

American hydro-electric practice. 439 p. 1917. McGraw, \$5 net.

*Canadian engineer*, Aug. 30, 1917, p.189. 1 col.

"Should be of service to the student or practising engineer who desires to study or keep in touch with recent practice as shown by modern installations."

*Electric journal*, Dec. 1917, adv. sec., p.38. ¾ col.

"Compilation of the practical and essential features of design, construction and operation as worked out in many plants and systems, interpreted and arranged for convenient use and references [*sic*] by plant designers, constructors and operating engineers."

*Engineering and mining journal*, Sept. 15, 1917, p.472. ¾ col.

"The general tone throughout the volume is the describing of what is proving successful, rather than the recommending of any cut-and-dried system or apparatus."

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820. ½ col.

"Not a textbook... but a compilation of the practical and essential features of design, construction and operation as used in many plants."

*Power*, Oct. 30, 1917, p.613. ¼ col.

"Handbook based on the study of American practice as found in a number of representative plants, brief descriptions of which are included... Will appeal alike to the designers and to the responsible operating men in hydro-electric plants."

**Teixeira, F. Gomes.**

Sur les problèmes célèbres de la géométrie élémentaire non résolubles avec la règle et le compas. 132 p. 1915. Imprimerie de l'Université, Coïmbre.

*Science progress*, July 1917, p.160. ¾ p.

"A very complete summary of the various solutions that have been given of the three celebrated problems: the duplication of the cube, the trisection or multisection of the angle, and the quadrature of the circle." *Philip E. B. Jourdain.*

**Thomas, Edward.**

Chemical patents and allied patent problems. Byrne, \$2.50.

*India rubber world*, Sept. 1917, p.727. ¾ col.

"Chemists and their attorneys will find it a clear and concise statement of the United States patent law. The major part of the work discusses broad underlying principles, while the remainder takes up points of practice and is accompanied by a virtually complete 'finding list' of the cases on which the law of chemical patents is based, also including other important cases intimately related in reasoning."

*Metallurgical & chemical engineering*, Oct. 1, 1917, p.441. ¾ col.

"Presents in very compact form a clear statement of the intention of the patent law of the United States in combination with a reference digest of some 1300 chemical or allied cases illustrative of the interpretation of the law as indicated by judicial opinion... Written from the point of view of an attorney or expert witness instead of that of a Patent Office Examiner."

**Thompson, A. Beeby.**

Oil field development and petroleum mining. 626 p. Van Nostrand, \$7.50.

*Economic geology*, Aug. 1917, p.480. 4½ p.

"Very readable work, well illustrated and attractively printed, and should prove an excellent text book. It may be recommended to petroleum geologists, engineers, and operators as the best work of its kind." *G. Sherburne Rogers.*

**Thompson, D'Arcy Wentworth.**

On growth and form. 779 p. 1917. Cambridge University Press, 21s. net.

*Engineer*, Oct. 26, 1917, p.365. 2½ col.

"Lays the foundations for the cooperation of the natural historian and the engineer in the absorbing study of mechanics of living creation."

*Engineering*, Sept. 14, 1917, p.272. 3 col.

"It is the object of the author to show that the mechanism of physics as well as teleology has to be weighed and studied as a factor influencing the complex problem that involves the relation of growth and form, and of function and form, in the varied manifestations of life... We are content to accept the book as a welcome expression of the tenets of a school of philosophic biology that is daily growing in authority and numbers."

*Nature*, Sept. 13, 1917, p.21. 3¾ col.

"This book, at once substantial and stately, is to the credit of British science and an achievement for its distinguished author to be proud of... It is an application of some of the concepts of physical science and sundry mathematical methods to the study of organic form." *J. Arthur Thomson.*

*Science*, Nov. 23, 1917, p.513. 2½ col.

"To show 'that throughout the whole range of organic morphology there are innumerable phenomena of form which are not peculiar to living things, but which are more or less simple manifestations of ordinary physical laws.'" *J. P. McM.*

*Science progress*, Oct. 1917, p.353. ¾ p.

"Very interesting book that has an appeal for biologist and mathematician, and in which both will find many suggestive hints for future work." *C. H. O'D.*

**Thompson, William Snow, comp.**

Directory of mailing lists. 323 p. 1917. Putnam, \$2.50 net.

*Scientific American*, Nov. 17, 1917, p.374. ⅛ col.

**Thomson, J. A.**

Study of animal life. Rev. ed. 477 p. 1917. Murray, 6s. net.

*Nature*, Oct. 25, 1917, p.142. 1⅓ col.

"Not...large...but it abounds in information, and the author sets it all forth in an easy way, with the practiced skill of an old hand at teaching." *D. W. T.*

**Thomson, William Rowan.**

The Rowan premium bonus system of payment by results. McCorquodale, 5s. net.

*Ironmonger*, Sept. 15, 1917, p.56. ¾ col.

"Its publication is singularly opportune, and its style so clear and forcible that we shall not be surprised if it exercises, in its peculiar field, a marked influence on any policy of reconstruction that may result from the war."

*Times (London); engineering supplement*, Sept. 28, 1917, p.199. ¾ col.

"The present description, given by one of the authors of the system... is the most complete that has appeared... The memorandum of arrangement is quoted in full in the book, and is well worth study."

**Thorburn, Archibald.**

British birds. 4v. v.4, 107 p. 1916. Longmans, £6, 6s. net.

*Nature*, Nov. 8, 1917, p.183, (review of v.4). ½ col.

"To those who wish to have a good coloured figure of every species of bird which has ever occurred in a wild state in this country, it may be said that this is the only work which can satisfy them. A more desirable book for the country-house library or billiard-room it would be difficult to find."



**Thum, Ernest Edgar.**

Practice book in elementary metallurgy. 313 p. 1917. Wiley, \$2.75.

*Canadian engineer*, Dec. 27, 1917, p.537.  $\frac{1}{2}$  col.

"Laboratory instruction book prepared for students working in the metallurgical laboratories of the University of Cincinnati...Is well and carefully written and is well illustrated, and will be helpful to instructors in metallurgical laboratories." *Alfred Stansfield*.

**Tilden, Sir William Augustus.**

Chemical discovery and invention in the twentieth century. 487 p. Dutton, 7s. 6d. net.

*Science progress*, Oct. 1917, p.348.  $\frac{3}{4}$  col.

"Deeply interesting and fascinating, not only to the lay mind, but also to the scientific elect...Despite the large amount of material dealt with, it is always concise and eminently readable. The illustrations are admirable and the book well got up." *Fredrick A. Mason*.

**Tillyard, R. J.**

Biology of dragonflies. 396 p. 1917. Cambridge University Press, 15s. net. (Cambridge zoological series.)

*Nature*, Oct. 18, 1917, p.123.  $1\frac{1}{2}$  col.

"Trustworthy guide to the external and internal structure of dragonflies at various stages of their life-histories." *G. H. Carpenter*.

*Museums journal*, Sept. 1917, p.47.  $\frac{1}{4}$  p.

"Will enable curators to infuse much interest into an exhibited series which should never be lacking in beauty."

**Timbie, W. H. & Higbie, H. H.**

Alternating-current electricity and its applications to industry. Second course. 729 p. 1916. Wiley, 13s. 6d. net.

*Nature*, Nov. 15, 1917, p.201.  $\frac{3}{4}$  col.

"Written...for the engineer who is responsible for the working of the machinery, and for the purchaser who pays the bills and seeks the profit. The special features...are the numerous questions and problems scattered throughout the text and the summaries in large type of the contents of the various chapters." *A. Russell*.

**Toch, Maximilian.**

Chemistry and technology of paints. Ed.2, rev. 366 p. 1916. Van Nostrand, \$4.

*Sibley journal of engineering*, Dec. 1917, adv. sec., p.44.  $\frac{1}{2}$  col.

"This excellent book...deserves a place in the library of every engineer. It covers just such points as should be known by everyone connected in any way with painting." *J. F. W.*

**Toogood, G. E.**

Principles of industrial administration. A. Brown, 1s. net.

*Engineering review*, Aug. 15, 1917, p.59.  $\frac{3}{4}$  col.

"Mr Toogood devotes the main portion of the book to showing that the principles of industrial management are to be found in a combination of economic, ethical, and physiological science."

**Treadwell, F. P.**

Analytical chemistry. Ed.4, tr. and rev. from 8th German ed. by W. T. Hall. v.1: Qualitative analysis. 538 p. 1916. Chapman & H., 12s. 6d. net.

*Science progress*, July 1917, p.166.  $\frac{1}{4}$  p.

"Prof. Hall reminds us in the Preface to the fourth English Edition that it is no longer to be regarded as a literal translation of the German text, as he has assimilated a good deal also from the text-books of Noyes, Stieglitz and others...Fully up to the standard of previous editions." *F. A. Mason*.

**Trelease, William.**

Plant materials of decorative gardening; the woody plants. 204 p. 1917. Author, Urbana, Ill., \$1.

*Journal of the American Pharmaceutical Association*, Oct. 1917, p.931.  $\frac{3}{4}$  col.

"Professor Trelease has rendered a real service to many of us." *E. K.*

*Mind and body*, Nov. 1917, p.339.  $\frac{1}{2}$  p.

"Entirely new guide to the usual trees, shrubs and woody climbers of park, garden and woods."

**Tryon, Rolla Milton.**

Household manufactures in the United States, 1640-1860; a study in industrial history. 413 p. 1917. Univ. of Chicago Press, \$2.

*Journal of home economics*, Nov. 1917, p.527.  $2\frac{3}{4}$  col.

"Represents a genuine contribution to our knowledge of household industry in relation to community and national economy." *Willistine Goodsell*.

**Tuttle, Lucius.**

Theory of measurements. 303 p. 1916. Jefferson Laboratory of Physics, Philadelphia, \$1.25.

*Physical review*, Oct. 1917, p.414.  $\frac{1}{2}$  p.

"Elementary treatise on the theory of measurements and computations made from experimentally obtained quantities...Contains much that every advanced student of quantitative experimental science should be thoroughly familiar with." *O. M. S.*

**Twiss, George Ransom.**

Textbook in the principles of science teaching. 513 p. 1917. Macmillan, \$1.40.

*Scientific American*, Nov. 17, 1917, p.374.  $\frac{1}{4}$  col.

"Full of sound suggestion...Intended for students who are looking forward to teaching science."

**Ugarte, José P.**

Cultivation and preparation of coffee. 124 p.

*Tea and coffee trade journal*, Sept. 1917, p.230.  $\frac{1}{2}$  col.

"This book, intended primarily for coffee planters, is well written and interesting, and describes the various operations in connection with coffee planting, tree pests and diseases, with remarks on pulping, fermenting, washing, drying, hulling, polishing and grading."

**Usherwood, T. S. & Trimble, C. J. A.**

Practical mathematics for technical students. pt.2. 565 p. 1916. Macmillan, 7s. 6d. net.

*Nature*, Sept. 20, 1917, p.41.  $\frac{3}{4}$  p.

"Not the kind of book one altogether likes, and we could not recommend it to students of the academic type." *G. H. B.*

**Venable, Francis P.**

Brief account of radio-activity. 54 p. 1917. Heath, \$50.

*Physical review*, Oct. 1917, p.413.  $\frac{1}{4}$  p.

"While...very small...yet it contains in a well-arranged and clearly written form the most important results of the work done in this field...Teachers of physics and chemistry will find it a good book for reference for their beginning students." *O. M. S.*

*Sibley journal of engineering*, Sept. 1917, adv. sec., p.12.  $\frac{3}{4}$  col.

"Very brief account of the phenomena of radio-activity, with a statement of the deductions there from. The six chapters are: 1. Discovery of radio-activity; 2. Properties of the radiations; 3. Changes in radio-activity bodies; 4. Nature of the Alpha particle; 5. The structure of the atom; 6. Radio-activity and chemical theory."

**Viall, Ethan.**

United States artillery ammunition. 97 p. 1917. McGraw, \$2.

*American machinist*, Sept. 6, 1917, p.438.  $\frac{1}{2}$  col.

"By far the most complete description ever attempted...Invaluable to any manufacturer, executive, mechanic or engineer who desires to be posted regarding United States arsenal methods of manufacturing American ammunition."

**Viall, Ethan—continued.**

*Journal of the American Society of Mechanical Engineers*, Sept. 1917, p.820. 5 l.

"Intended to give shop men, engineers and manufacturers an accurate knowledge of the sizes, tools, shop work and gages for the more commonly used United States shells and cartridge cases."

**Villavecchia, Vittorio.**

Trattato di chimica analytica applicata. v.2. 719 p. 1917. Hoepli, Milan, 18 fr. 50.

*Bulletin de la Société d'Encouragement*, July-Aug. 1917, p.157. ½ p.

**Vivanti, Giulio.**

Elementi della teoria delle equazioni integrali lineari. 398 p. 1916. Hoepli, Milan, 4.50 lire.

*Science progress*, July 1917, p.160. ½ p.

"A most valuable and complete summary of our present knowledge of the theory of integral equations." *Philip E. B. Jourdain*.

**Vosmaer, A.**

Ozone; its manufacture, properties and uses. 197 p. 1916. Van Nostrand, \$2.50.

*Chemical news*, Aug. 10, 1917, p.72. ¼ col.

"While the book does not contain very much new matter the discussions and descriptions are full and detailed...Readable and interesting."

*Physical review*, Nov. 1917, p.589. 9 l.

"Distinctly technical rather than scientific." *N. E. D.*

*Science progress*, Oct. 1917, p.349. 1 p.

"The account given of the properties and chemical structure of ozone is incomplete and unsatisfying, and this applies to a good many other sections of the book. The chapter, however, dealing with the brush discharge and the conditions which underlie its successful production is excellent...Useful work of reference."

**Walker-Tisdale, C. W. & Woodnutt, W. E.**

Practical cheesemaking; a general guide to the manufacture of cheese. 182 p. 1917. Headley, 4s. 6d. net.

*Nature*, Nov. 15, 1917, p.204. ½ col.

"Deals with the technical side of cheese-making, and is intended to serve both as a text-book for dairy students and as a reference-book for practical cheesemakers."

**Wall, Otto A.**

Hand book of pharmacognosy. Ed.4. 629 p. 1917. Mosby.

*American journal of pharmacy*, Nov. 1917, p.554. 1½ p.

"Object...is mainly to serve as notes...for students in colleges of pharmacy, for students preparing for State Board of Pharmacy examinations and for every day exigencies of the retail pharmacist." *Heber W. Youngken*.

**Wall, Otto A.**

The prescription, therapeutically, pharmaceutically, grammatically and historically considered. Ed.4, rev. 273 p. 1917. Mosby, \$2.50.

*American journal of pharmacy*, Dec. 1917, p.620. 1 p.

"Author has handled his subject, in general, in a logical, lucid and forceful manner. As a result of this, the work is not only a valuable book for the reference library of the pharmacist and the physician, but, also, an excellent one for hours of interesting and instructive reading." *G. M. Beringer, jr.*

*Journal of the American Pharmaceutical Association*, Oct. 1917, p.930. 1 col.

"A unique volume in American pharmaceutical and medical literature...Is being appreciated by technical and professional students." *E. K.*

*Midland druggist and pharmaceutical review*, Nov. 1917, p.460. ¾ p.

"Approaches the subject from almost every standpoint and the student can find in the text the history of the prescription from the earliest time down to the present."



**Wallis-Taylor, A. J.**

The preservation of wood. 372 p. Rider, 10s. 6d.

*Chemical news*, Dec. 7, 1917, p.281. ½ col.

"All buyers and users of timber will find that it will repay careful study. Methods of destroying dry rot and fungi... are fully discussed."

*Engineer*, Oct. 19, 1917, p.341. ½ col.

"Written in a practical manner, but the author's literary style is not always as clear and grammatical as it might be."

*Iron and coal trades review*, Nov. 16, 1917, p.552. 1 col.

"Probably the first of its kind in respect of fulness and comprehensiveness, of the various preserving processes and mechanical appliances used in connection with them."

**Walter, Erich.**

Manual for the essence industry. 427 p. 1916. Wiley, \$4.

*Journal of industrial and engineering chemistry*, Sept. 1917, p.918. ½ col.

"Valuable rather on account of the breadth of its scope than the completeness with which any branch of the subject is treated." *P. C. McIlhiney*.

**Waterbury, L. A.**

Stresses in structural steel angles, with special tables. 77 p. 1917. Wiley, \$1.25 net.

*Canadian engineer*, Nov. 29, 1917, p.463. ½ col.

"Devotes the first 27 pages to the theory and a discussion of the stresses in angles... The balance of the text considers combined stresses, with special attention given to the effect of end connections." *A. H. Harkness*.

**Watt, H. J.**

Psychology of sound. 241 p. 1917. Cambridge University Press, 10s. 6d. net.

*Nature*, Aug. 9, 1917, p.462. 1½ col.

"One of the most important presentations of the sense of hearing since the time of Helmholtz. It is true Dr. Watt discusses hearing more from the psychological than from the physiological point of view; he is less interested in the physiological mechanism than in the mental experiences associated with hearing... [Has] an extensive bibliography... [and] an excellent index." *J. G. M.*

**Watt, Homer Andrew.**

Composition of technical papers. 431 p. 1917. McGraw, \$1.50 net.

*Canadian engineer*, Dec. 27, 1917, p.535. 1 col.

"Describes in logical sequence and clearness of detail the real problems to be met in the composition of papers descriptive of every-day engineering undertakings, and gives in a clear and precise manner the solution of main problems in analytical English composition... Should be especially valuable as a study in connection with an university engineering course." *A. J. Meyers*.

*Electric journal*, Dec. 1917, p.38. ½ col.

"A thorough study of this book should be helpful."

*Engineer*, Oct. 19, 1917, p.341. ¾ col.

*Engineering news-record*, Nov. 15, 1917, p.937. 2½ col.

"Written with one aim, and one aim only—to teach engineering students to write better technical papers." *Mont Schuyler*.

*Mining and scientific press*, Dec. 29, 1917, p.947. 1 col.

"Elementary book for students and engineers without university training. A little more than a third of the volume is devoted to examples of technical writing... Mr. Watt, like most writers on the subject, illustrates unintentionally the errors against which he preaches." *T. A. R.*

**Weaver, Erasmus M.**

Notes on military explosives. Ed.4, rev. & enl. 382 p. 1917. Wiley, \$3.25 net.

*Mining and scientific press*, Dec. 29, 1917, p.948. ½ col.

"Authoritative treatise on a subject of pronounced importance and of great interest at this moment is enriched by an important discussion on 'The Rôle of Chemistry in the War,' by Allerton S. Cushman... General Weaver... has given an introductory chapter

**Weaver, Erasmus M.—continued.**

...which is so simple that any man of general education would be prepared for an undertaking of what follows, even though he had not devoted a large amount of attention to chemical subjects...As a convenient handbook, it is a most commendable treatise."

**Webb, Sidney.**

The works manager to-day. 162 p. Longmans, 3s. 6d. net.

*Ironmonger*, Nov. 10, 1917, p.56. 6-7 col.

"Address under review was prepared 'for a series of private gatherings of works managers.'"

**Webb, Walter Loring.**

Railroad construction, theory and practice; a text-book for the use of students in colleges and technical schools, and a hand-book for the use of engineers in field and office. Ed.6, rev. & enl. 831 p. Wiley, \$4.

*Canadian engineer*, Aug. 30, 1917, p.187, (letter to editor) 2 col; Sept. 27, 1917, p.283. 3/4 col.

"I do not believe that one hundredth part of the ground that is covered in this book should be attempted in any book."

*Engineering news-record*, Oct. 18, 1917, p.752. 3/4 col.

"Reviewer finds little to blame and much to praise in the present edition." *M. P.*

**Paret.**

*Railway age gazette*, Aug. 31, 1917, p.373. 1/2 col.

**Webb, Walter Loring, & Fish, J. C. L.**

Technic of surveying instruments and methods, including general and detailed instructions for field and office work of extended students' surveys. 319 p. 1917. Wiley, \$2 net.

*Canadian engineer*, Dec. 27, 1917, p.537. 12 l.

"Of a convenient size, clearly printed, and should commend itself to any instructor wishing to give his pupils a thorough knowledge of surveying instruments and their uses." *Tracy D'Lemay*.

**Weick, Charles William.**

Mechanical drawing problems. 153 p. McGraw, \$1.25 net.

*Engineering news-record*, Dec. 20, 1917, p.1170. 1/2 col.

"Well made and illustrated, but has no striking feature to distinguish it from other books of the same character...The only portion which would interest the engineering student is the section on development of surfaces, and that because of its relation to sheet metal work." *Alton L. Smith*.

*Machinery*, Nov. 1917, p.282. 12l.

"Satisfactory...for either school or self instruction."

**Weld, Leroy D.**

Theory of errors and least squares. 190p. 1916. Macmillan, 5s.6d.net.

*Bulletin of the American Mathematical Society*, Dec. 1917, p.158. 1 p.

"Intended for those research workers who wish to use the method of least squares in dealing with their observations, but who have little knowledge of mathematics." *Ernest W. Brown*.

*Science progress*, July 1917, p.161. 3/4 p.

"The reading of this book inspires us with the lively desire that at least the elementary questions of the theory of errors should be included in all elementary courses in mathematics." *Philip E. B. Jourdain*.

**West, G. S.**

Algæ. v.i. 475 p. 1916. Putnam, \$7.50. (Cambridge botanical handbooks.)

*Science*, Oct. 26, 1917, p.413. 3 col.

"A life-long interest in, and an ever-increasing acquaintanceship with the extraordinarily diversified and numerous organisms embraced within the scope of this work have qualified this leading British algologist to undertake this task...Professor West's work is of great value in facilitating excursions of zoologists into one fundamental and suggestive field of botanical research." *Charles Atwood Kofoid*.

*Science progress*, July 1917, p.170. 1 p.

"Prof. West has...supplied a real need." *E. J. Salisbury*.

**Whipple, George Chandler.**

State sanitation; a review of the work of the Massachusetts state board of health. v.1. 377 p. Harvard Univ. Press, \$2.50.

*Industrial management*, Oct. 1917, p.157. ¼ col.

"First volume of a series on the subject...Treats of the work that has been done in the State of Massachusetts by the State Board of Health in the matter of water supply and drainage."

**White, Benjamin.**

Silver; its history and romance. 350 p. Hodder & S., 21s. net.

*Mining magazine*, Sept. 1917, p.146. 2¾ col.

"The manner in which the subject is treated is easy and light, and no attempt is made at profundities or technicalities...Full of fascinating facts."

**White, E. F.**

White's vest pocket sundae formulary. 200 p. Spatula Co., \$1.

*Druggists circular*, Sept. 1917, p.487. 5 l.

"Compact and comprehensive guide."

*Midland druggist and pharmaceutical review*, Sept. 1917, p.362. ½ p.

"Has over 1500 formulas, some of them never before published, and the reputation of the author is sufficient to recommend the book." *A. G. B.*

**White, Edmund, comp.**

Analytical reagents, standards and tests. 92 p. Hopkin, 1s. net.

*Scientific American*, Dec. 22, 1917, p.488. 10 l.

"Subjects are taken up alphabetically, from acetic acid to zinc sulphate, with descriptions and tests culled from numerous sources as well as from the experience of the author."

**White, Lazarus, & Prentis, E. A.**

Modern underpinning. 91 p. 1917. Wiley, 7s. net. (Wiley engineering series.)

*Concrete and constructional engineering*, Dec. 1917, p.702. ½ col.

"We...welcome this volume, which gives a description of the most modern methods of dealing with this difficult subject...A manual of practice...An able exposition of the difficulties met with in the building of the New York subways and the means taken to overcome them."

*Engineering review*, Nov. 15, 1917, p.144. ¼ col.

"Contains a large number of photographs and special drawings illustrating the progress of underpinning since 1900, during the building of the New York subways." *E. S. A.*

**Whittaker, E. T.**

Treatise on the analytical dynamics of particles and rigid bodies, with an introduction to the problem of three bodies. Ed.2. 432 p. 1917. Cambridge University Press, 15s. net.

*Science progress*, Oct. 1917, p.345. ¼ p.

"Not very many important alterations in this second edition...Chief value...lies in the thorough, systematic, and modern treatment of the integration and transformation of the dynamical equations...There is rather a noticeable...neglect of work published from 1904 to 1908 on the questions that arise in formulating Hamilton's principle and the principle of least action for non-holonomic conditions and generalised co-ordinates." *Philip E. B. Jourdain.*

**Wigmore, John H. and others, ed.**

Science and learning in France. 454 p. 1917. Society for American Fellowships in French Universities, Chicago, \$1.60.

*Journal of physical chemistry*, Oct. 1917, p.603. 2¾ p.

"Purpose in this volume is, primarily, to put before the American public the contributions of France in all fields of scientific knowledge, and to show her status in the forefront of the world's progress; and, in addition, to furnish to American university students all information bearing on graduate work in France." *Wilder D. Bancroft.*



**Wilcox, E. V.**

Tropical agriculture. 373 p. 1916. Appleton, 10s. 6d. net.

*Nature*, May 3, 1917, p.183. 1½ col.

"As it stands, cannot become a text-book for either the merchant or the student. It needs drastic revision."

**Williams, Clement C.**

Design of railway location. 517 p. Wiley, \$3.50 net.

*Engineering education*, Nov. 1917, p.134. ¾ p.

"Intended primarily as a text but there is much...which will be of value to those engineers engaged in practical railroad work...Gathers together in one volume of convenient size practically all the fundamentals concerning the important branches of rail-roading." *L. W. McCl.*

*Engineering review*, Nov. 15, 1917, p.143. 1 col.

"Deals thoroughly with underlying principles and enables the student to get sound ideas concerning the physical and economic conditions that control the location of rail-ways in order that their operation may be at maximum safety and efficiency." *R. E. Neale.*

**Winslow, Charles Edward Amory.**

Handbook of health in war and peace; a manual of personal preparedness. 51 p. 1917. Am. Museum of Natural History, \$25.

*American journal of public health*, Dec. 1917, p.1052. ½ col.

"Constitutes an admirable health guide and contains a surprisingly large amount of practical information within small compass...The material is well chosen, the presenta-tion simple, clear and interesting." *Charles F. Bolduan.*

**Winslow, Kenelm.**

Prevention of disease. 348 p. 1916. Saunders, \$1.75.

*Journal of home economics*, Oct. 1917, p.483. ¾ col.

"Dr. Winslow has been moderate in his statements, well balanced in his discussions, and thoroughly conscientious in his presentation of the truths of preventive medicine as accepted today." *Ira S. Wile.*

**Winton, Andrew L. and others.**

Microscopy of vegetable foods. Ed.2. 701 p. \$6.50.

*Journal of the American Chemical Society*, Oct. 1917, p.2243. 1¼ p.

"Character of most of the illustrations leaves little in that respect to be desired... Intended as a laboratory hand-book." *B. J. Howard.*

**Wood, Casey Albert.**

Fundus oculi of birds, especially as viewed by the ophthalmoscope; a study in comparative anatomy and physiology. 180 p. 1917. Lake-side, \$15.

*Nature*, Dec. 27, 1917, p.322. 1¾ col.

"Dr. Wood is the first to make a systematic examination of the fundus appearances in the eyes of birds, and the present volume, with its beautiful series of illustrations by Mr. A. W. Head, is a sufficient proof that it has been a labour of love."

*Saint Paul medical journal*, Sept. 1917, p.296. 1¼ col.

"Casey Wood after long painstaking application and great expense has for his re-ward the authorship of a volume which is a valuable contribution to science." *Paul D. Berrisford.*

*Science progress*, Oct. 1917, p.355. ¾ p.

**Wood, Harold Bacon.**

Sanitation practically applied. 463 p. 1917. Wiley, \$3. net.

*American journal of public health*, Dec. 1917, p.1053. 1 col.

"The more important diseases are taken up in turn and in a remarkably concise way the practical details of their control are touched upon...Written particularly for the health officer in the smaller municipalities...though it is...intended also for laymen who are interested in promoting the health of their communities." *Charles V. Chapin.*

**Woodhead, T. W.**

Study of plants; an introduction to botany and plant ecology. 424 p. 1915. Clarendon Press, \$1.40.

*Botanical gazette*, Sept. 1917, p.253. ¾ p.

"It is a pleasure to note that emphasis is placed upon the work of plants and their relation to the habitat. Form is considered in relation to function, and the amount of microscopic work is reduced to a minimum...As a book of secondary reference and as a source of different ideas and new material it should not be overlooked." *Geo. D. Fuller.*

**Woods, Clinton E.**

Unified accounting methods for industrials. 550 p. Ronald, \$5.

*Electric railway journal*, Dec. 1, 1917. p.1014. ¼ col.

"The particular methods advocated would without doubt give valuable suggestions along purchasing, stores, shops and other lines."

*Gas engine*, Dec. 1917, p.614. 1½ col.

*Journal of the American Society of Mechanical Engineers*, Dec. 1917, p.1052. 2 col.

"Presents a clear outline of the matter and forms a valuable addition to the literature of the subject." *George M. Forrest.*

**Woolsey, Theodore S. jr.**

French forests and forestry. 238 p. 1917. Wiley, \$2.50.

*Journal of forestry*, Dec. 1917, p.1017. 4¾ p.

"The title...at least the cover title, is misleading in rousing the expectation that a general discussion of the forest practice of France is intended, when in fact forest conditions and practice in three dependencies are only treated, namely, those of Tunisia, Algeria, and Corsica." *B. E. F.*

**Worsdell, Wilson C.**

Principles of plant-teratology. 2v. Ray Society, London, 25s. net each.

v.1. 270 p. 1915.

v.2. 296 p. 1916.

*Nature*, Aug. 23, 1917, p.501, (review of v.2). 1 col.

"The study of plant abnormalities is full of variety and interest, and rich in surprises; to have prepared a book of reference on the subject is to have earned the gratitude of one's fellow-botanists. But Mr. Worsdell's work would have claimed a higher position if fewer pages had been devoted to theorising; the rôle of the recorder is an eminently useful one."

*Science progress*, July 1917, p.171. ¾ p.

"First volume deals with the vegetative organs of flowering plants and the comparatively few recorded abnormalities in the Fungi and Bryophyta, and the second with the flower." *E. J. Salisbury.*

**Wynne, Walter E. & Spraragen, W.**

Handbook of engineering mathematics. 220 p. Van Nostrand, \$2 net.

*Canadian engineer*, Sept. 27, 1917, p.284. ½ col.

"It is seldom that one meets with a book in which scientific knowledge has been so judiciously combined with teaching skill and sound common-sense...Any engineer who sees the work will at once feel he must own it." *Alfred Baker.*

**Year book of wireless telegraphy and telephony, 1917. 928 p. Wireless Press, 3s. 6d. net.**

*Electrical review (London)*, Aug. 10, 1917, p.141. 1½ col.

"The fifth issue of this well-known year-book has been considerably extended in point of size, and still more so in point of matter contained...The list of land and ship stations is unique and invaluable...The standard features of the technical section have again been revised and brought up to date."

*Electrician*, Sept. 28, 1917, p.1008. ¾ col.

"Contains the usual amount of standard information and data...A distinctly creditable production."

**Yoder, Jacob H. & Wharen, G. B.**

Locomotive valves and valve gears, with a special treatise on valve setting. 270 p. 1917. Van Nostrand, \$3 net.

*Railway mechanical engineer*, Nov. 1917, p.612. ½ col.

"Well illustrated throughout and...will be a valuable addition to the library of any ambitious mechanic."

**Young, Robert B.**

The banket; a study of the auriferous conglomerates of the Witwatersrand and the associated rocks. 117 p. 1917. Gurney & J.

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, June 1917, p.230. 1 col.

"Of great importance to metallurgists and all engaged in the extraction of gold, for it gives the best account so far published of the world's most important source of the precious metal." *H. A. W.*

**Zsigmondy, Richard, and others.**

Chemistry of colloids. 288 p. 1917. Wiley, \$3.

*Canadian engineer*, Dec. 27, 1917, p.537. 1 col.

"Very useful brief of the whole subject and will not fail to be suggestive of useful applications to men engaged in almost any form of industrial technology." *T. Linsey Crossley*.

### A Few Recent Serials, Reviewed During 1917

**American journal of syphilis.** C. V. Mosby Co., St. Louis.

*Social hygiene*, April 1917, p.276. 1 p.

"A new quarterly journal...The January (1917) number contains two hundred and sixty pages of text devoted to interesting and valuable articles."

**Business digest.** Cumulative Digest Corporation, New York, \$3.

*Publishers' weekly*, Aug. 18, 1917, p.574, (review of v.1, Jan.-March 1917). ¾ col.

"Typographically the volume...is excellent, and the editorial work seems generally in keeping...This would seem to be one of the few things which any business man, literally, 'could not afford to be without.'" *J. N.*

**Canadian chemical journal.** Biggar Press, Ltd., Toronto, \$2.

*Chemical news*, Aug. 24, 1917, p.95, (review of v.1, no.2). ¼ col.

"Has appeared at an opportune moment, and it is to be hoped that it will have a long and vigorous life...From the articles in this copy...it may be foretold that it is going to have a useful career."

**Medical clinics of Chicago.** Saunders, Philadelphia, \$8.

*Saint Paul medical journal*, Dec. 1917, p.381, (review of v.1, no.2). ½ col.

"Is a particularly interesting number covering a wide range of subjects and clinical cases." *C. N. Hensel*.

**Medical clinics of North America.** Saunders, Philadelphia, \$10.

*Saint Paul medical journal*, Dec. 1917, p.381, (review of v.1, no.2). ½ col.

"A stenographic report of the actual clinics of the men and the institutions named, this volume being devoted to the schools and hospitals of Philadelphia...The work is deserving of commendation." *H. O. Skinner*.

**Missouri—State highway department.**

Missouri highway bulletin. 48 p.

*Good roads*, Aug. 18, 1917, p.92, (review of v.1, no.1). ½ col.

"To encourage the improvement of state and county highways as provided by the new road law and correlated measures."

**Puget sound marine station.**

Publications. v.1, no. 17-24. 1916.

*Botanical gazette*, May 1917, p.415.



**Society of Chemical Industry.**

Annual reports on the progress of applied chemistry. v.1, 1916.  
1917. The Society, London, 3s. 6d.

*Analyst*, Sept. 1917, p.318. 1 p.

"Does not cover all the sections dealt with in the Society's journal, partly because those on fibres, dyeing, metallurgy, electro-chemistry, and sugar were not completed in time, and partly because agricultural and analytical chemistry and the chemistry of food and drugs, having been dealt with in the Annual Report issued by the Chemical Society, were purposely omitted...The Society of Chemical Industry is to be congratulated on having initiated a new and valuable departure." *Cecil H. Cribb*.

*Engineering*, Sept. 7, 1917, p.260. 3½ col.

*India rubber world*, Sept. 1, 1917, p.727. ¼ col.

"Presents the progress of applied chemistry, from January, 1914, to June, 1916, reviewed in 15 sections, each by a recognized authority."

*Iron and coal trades review*, Aug. 13, 1917, p.121. ½ col.

"The only fault the reader can find with some of the reports will be that they are too short."

*Journal of physical chemistry*, Dec. 1917, p.785. 2½ p.

*Journal of the Chemical, Metallurgical and Mining Society of South Africa*, Sept. 1917, p.88. 1 col.

*Scientific American*, Nov. 3, 1917, p.340. 1-7 col.

**Society of Glass Technology.**

Journal. 1917. The Society.

*Illuminating engineer*, Aug. 1917, p.223, (review of v.1, no.1). 1½ col.

"Headquarters at Sheffield University, where a special department has been formed to study this subject experimentally."

*Mining magazine*, Nov. 1917, p.247. ½ col.

"The section...devoted to abstracts and reviews is unusually complete and well done, and readers will be kept fully informed of the literature on glass subjects published throughout the world."

**Surgical clinics of Chicago.** 221 p. Saunders, Philadelphia, \$10.

*Pennsylvania medical journal*, April 1917, p.523, (review of v.1, no.1). ½ col.

[The text in this section is extremely faint and illegible. It appears to be a list or a series of entries, possibly containing names and dates, but the characters are too light to transcribe accurately.]

## Publications of the Library Now in Print

Where two prices are given, the first is that for which the publication is sold at the Library only. All prices are strictly net, except for individual publications ordered in lots of twenty or more. Remittances must be made in advance, payable to Carnegie Library of Pittsburgh. All publications not marked \* may be had free at the Library, or will be sent postpaid for 5 cents each.

### \*Classified Catalogue of the Carnegie Library of Pittsburgh.

FIRST SERIES, 1895-1902. 1907. vol. 1-3. 3,890 pp. \$12.00.

SECOND SERIES, 1902-1906. 1908. vol. 4-5. 2,020 pp. \$5.00.

THIRD SERIES, 1907-1911. 1914. vol. 6-8. 3,475 pp. \$8.00.

Bound in buckram with gilt tops. Include full author and subject indexes.

*The same* [in pamphlet form].

FIRST SERIES, 1895-1902. 10 parts. 1903-07.

Part 1. General Works. 1907. 67 pp. 10 cents, postpaid.

Part 2. Philosophy and Religion. 1903. 223 pp. Out of print.

Part 3. Sociology and Philology. 1904. 340 pp. 15 cents; postpaid, 25 cents.

Part 4. Natural Science and Useful Arts. 1904. 598 pp. 35 cents; postpaid, 50 cents.

Part 5. Fine Arts. 1905. 351 pp. 15 cents; postpaid, 25 cents.

Part 6. Literature. 1905. 308 pp. 15 cents; postpaid, 25 cents.

Part 7. Fiction. 1906. 446 pp. 25 cents; postpaid, 40 cents.

Part 8. History and Travel. 1907. 691 pp. 50 cents; postpaid, 65 cents.

Part 9. Biography. 1907. 381 pp. 20 cents; postpaid, 30 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1907. 850 pp. \$1.00; postpaid, \$1.20.

SECOND SERIES, 1902-1906. 5 parts. 1907-08.

Part 1. General Works, Philosophy, Religion, Sociology and Philology. 1907. 425 pp. Out of print.

Part 2. Natural Science, Useful Arts and Fine Arts. 1907. 477 pp. 45 cents; postpaid, 60 cents.

Part 3. Literature, English Fiction and Fiction in Foreign Languages. 1908. 342 pp. 40 cents; postpaid, 50 cents.

Part 4. History and Travel, Collected Biography and Individual Biography. 1908. 465 pp. 45 cents; postpaid, 60 cents.

Part 5. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1908. 460 pp. 80 cents; postpaid, 95 cents.

THIRD SERIES, 1907-1911. 10 parts. 1912-14.

Part 1. General Works, Philosophy, Religion. 1912. 372 pp. 40 cents; postpaid, 50 cents.

Part 2. Sociology, Philology. 1912. 418 pp. 45 cents; postpaid, 60 cents.

Part 3. Natural Science, Useful Arts. 1913. 623 pp. 60 cents; postpaid, 75 cents.

Part 4. Fine Arts. 1913. 237 pp. 25 cents; postpaid, 35 cents.

Part 5. Literature. 1913. 271 pp. 30 cents; postpaid, 40 cents.

Part 6. English Fiction, Fiction in Foreign Languages. 1913. 294 pp. 30 cents; postpaid, 40 cents.

Part 7. History and Travel. 1914. 401 pp. 40 cents; postpaid, 50 cents.

Part 8. Biography. 1914. 276 pp. 30 cents; postpaid, 40 cents.

Part 9. Books for the Blind. 1914. 44 pp. 5 cents; postpaid, 10 cents.

Part 10. Indexes, Title-pages, Contents, Preface and Synopsis of Classification. 1914. 816 pp. 80 cents; postpaid, \$1.00.

**Monthly Bulletin.** 50 cents a year, postpaid.

Not published in August and September.

**Annual Report,** 1st-21st, 1896-1916. Sent free upon request.

Except the 3d, 6th and 20th, which are out of print.

**Catalogue of the Carnegie Library School;** a school for training in General Library Work, Library Work with Children and School Library Work. Sent free upon request.

**Periodicals and Other Serials Currently Received by the Carnegie Library of Pittsburgh.** 7th edition. 1915. 42 pp.



- 226
- Books in the Library of the American Philatelic Society. 1910. 20 pp.  
 Carnegie Institute and Library of Pittsburgh. 1916. 32 pp.  
 Rules for Filing Cards in the Dictionary Catalogues of the Carnegie  
 Library of Pittsburgh. 2d edition. 1917. 32 pp.  
 What a Public Library Finds to Do; by Elisa May Willard. 1917. 18 pp.

## Reference Lists

### History

- Books of Interest in Connection with the European War. 1914. 26 pp.  
 Braddock's Expedition. 11 pp. (Monthly Bulletin, Nov. 1906.)  
 Expedition of General Forbes against Fort Duquesne. 1908. 20 pp.  
 Expeditions of Colonel Bouquet to the Ohio Country, 1763 and 1764.  
 11 pp. (Monthly Bulletin, Dec. 1909.)  
 Letters of General Forbes; Reprint of 35 Letters Relating to the Ex-  
 pedition against Fort Duquesne. 63 pp. 20 cents, postpaid.  
 (Monthly Bulletin, Feb.-May 1909.)  
 \*Pennsylvania; a Reading List for the Use of Schools, with Special  
 Reference to Indian Warfare and the Local History of Pitts-  
 burgh. 1911. 83 pp. 20 cents; postpaid, 25 cents.  
 Pittsburgh in 1816. 1916. 75 pp.  
 Washington's Visits to Pittsburgh and the Ohio Country. 15 pp.  
 (Monthly Bulletin, Feb. 1908.)  
 The Whiskey Insurrection. 9 pp. (Monthly Bulletin, July 1906.)

### Biography

- Famous Royal Women; a Reading List for Girls. 1908. 11 pp.  
 Lives and Letters; a Selected and Annotated List. 1910. 36 pp.  
 \*Men of Science and Industry; a Guide to the Biographies of Scientists,  
 Engineers, Inventors and Physicians, in the Carnegie Library of  
 Pittsburgh. 1915. 189 pp. 20 cents; postpaid, 30 cents.  
 Patriots; a Reading List for Boys and Girls. 1912. 17 pp.

### Sociology

- Housing. 1912. 45 pp.  
 Immigration. 1918. 12 pp.  
 Vocational Guidance. Supplement. 10 pp. (Monthly Bulletin, Dec.  
 1915.)

### Debating

- \*Debate Index. 2d edition. 1912. 84 pp. 15 cents; postpaid, 20 cents.  
 Debate Index. Supplement. 1913. 23 pp.  
 Debate Index. Second supplement. 1916. 15 pp.  
 Debate Index. Third supplement. 1917. 14 pp.

### Publications of Interest to Engineers

- Air-Brakes. 1915. 55 pp.  
 Air Conditioning. 1914. 58 pp.  
 Brick Manufacture and Bricklaying. 26 pp. (Monthly Bulletin, Jan.  
 1912.)  
 By-Product Coking. 1915. 40 pp.  
 Case-Hardening. 1918. 10 pp.  
 Electric Driving in Rolling-Mills and Foundries. 11 pp. (Monthly  
 Bulletin, Nov. 1907.)  
 Electric Heating and Cooking. 1910. 16 pp.  
 Engineering Ethics. 1917. 17 pp.  
 Floods and Flood Protection. 48 pp. (Monthly Bulletin, July 1908.)  
 Floods and Flood Protection. Supplement. 1911. 19 pp.  
 The Gyroscope. 1917. 23 pp.  
 Housing. 1912. 45 pp.

- \***Index to Proceedings of the Engineers' Society of Western Pennsylvania**, Volumes 1 to 20, 1880-1904; Compiled by Harrison W. Craver. 1906. 144 pp. \$1.00 postpaid.
- \***Index to the Classified Catalogue of the Technology Department**. 2d edition. 1916. 63 pp. 10 cents.
- List of Technical Indexes and Bibliographies Appearing Serially**. 1910. 17 pp.
- Market Prices Appearing Currently in Technical and Trade Journals**. 1918. 6 pp.
- \***Men of Science and Industry**; a Guide to the Biographies of Scientists, Engineers, Inventors and Physicians, in the Carnegie Library of Pittsburgh. 1915. 189 pp. 20 cents; postpaid, 30 cents.
- Metal Corrosion and Protection**. 2d edition, revised and enlarged. 58 pp. (Monthly Bulletin, July 1909.)
- Mica**. 12 pp. (Monthly Bulletin, Oct. 1908.)
- One Hundred Recent Books on Agriculture**. 1910. 19 pp.
- Refuse and Garbage Disposal**. 1909. 39 pp.
- Road Dust Preventives**. 1916. 39 pp.
- \***Sand**; its occurrence, properties and uses. 1918. 72 pp. 15 cents, postpaid.
- Scientific and Technical Reference Books**. 19 pp. (Monthly Bulletin, Nov. 1916.)
- \***Sewage Disposal and Treatment**. 1910. 96 pp. 15 cents, postpaid.
- Smoke Prevention**. 18 pp. (Monthly Bulletin, May 1907.)
- Sodium Nitrate Industry of Chile**. 7 pp. (Monthly Bulletin, March 1908.)
- Steam Turbines**. 21 pp. (Monthly Bulletin, Nov. 1904.)
- \***Technical Book Review Index**, v.1, no.1-6, March-Dec. 1917. 50 cents a year, postpaid.  
No.1-3, March, April, May, published in the Monthly Bulletin of those months, 5 cents each, postpaid.  
No.4-6, July-Dec. issued separately, 15 cents each, postpaid.
- Trees and Forestry**. 1917. 18 pp.
- Water Softening**. 8 pp. (Monthly Bulletin, June 1904.)

### Library Work with Children

- \***Catalogue of Books, Annotated and Arranged, and Provided by the Carnegie Library of Pittsburgh for the Use of the First Eight Grades in the Pittsburgh Schools**. 1907. 331 pp. 35 cents; postpaid, 50 cents.
- \***Annotated Catalogue of Books Used in the Home Libraries and Reading Clubs**. 1905. 110 pp. 20 cents; postpaid, 25 cents.
- Illustrated Editions of Children's Books**. 1915. 20 pp.

### Story-Telling

- Stories from the Ballads of Robin Hood; Outlines for Story-Telling**. 1914. 38 pp.
- Stories from the Norse; Outlines for Story-Telling**. 1914. 22 pp.
- \***Stories to Tell to Children**. 2d edition. 1918. 72 pp. 25 cents.
- Story Hour Courses for Children from Greek Myths, the Iliad and the Odyssey**. 1906. 32 pp.

### Reading Lists

- Famous Royal Women; a Reading List for Girls**. 1908. 11 pp.
- "Foreign Lands Where Wonders Are."** 1911. 14 pp.
- Patriots; a Reading List for Boys and Girls**. 1912. 17 pp.
- \***Pennsylvania; a Reading List for the Use of Schools, with Special Reference to Indian Warfare and the Local History of Pittsburgh**. 1911. 83 pp. 20 cents; postpaid, 25 cents.











579484

Technical Book Review Index.  
v.1 (1917)

P  
Bb  
T

**University of Toronto  
Library**

**DO NOT  
REMOVE  
THE  
CARD  
FROM  
THIS  
POCKET**

Acme Library Card Pocket  
LOWE-MARTIN CO. LIMITED



